

Manufacturers Record

Exponent of America



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Baltimore, Md.
APRIL 8, 1920

"SIX DAYS SHALT THOU LABOR AND DO ALL THY WORK"

The same God who laid upon the children of Israel the injunction to observe the sanctity of the Sabbath proclaimed also the holiness of toil and declared that labor is the law of salvation. In this crucial period of human history it behooves us all to give heed not to one-seventh of this commandment only, but to the six-sevenths with which the Almighty glorified toil and translated work into a form of worship.

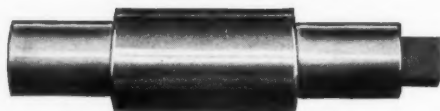
There is nothing in this commandment that we of the present day are warranted in interpreting as Divine Sanction for shorter hours or artificial restriction of production. "Six days shalt thou labor"—not six hours a day, not even eight hours a day, but so many hours as may be required to do *all* thy work. So long as production lags behind the needs of a hungry world, all our work is not done, and every hour wrested from the working schedule of the week is an hour of violence to humanity and of blasphemy to God.

If the executives, the sales managers, the bookkeepers, the stenographers and the clerks, the advertising men and those of the sales force do not work with a keener sense of the obligations that rest upon them—if those in the high places do not make their brains more productive, small license shall they have for casting the stone of opprobrium at the ignorant, the brutal and the reactionary in the ranks of organized or unorganized physical labor.—From "Paragrafs," issued by the Whitaker Paper Co., Cincinnati.

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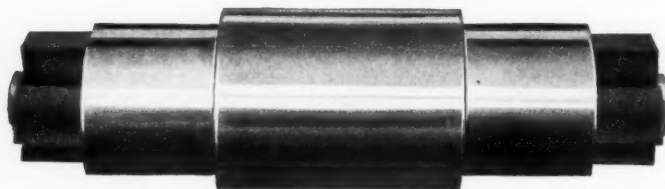
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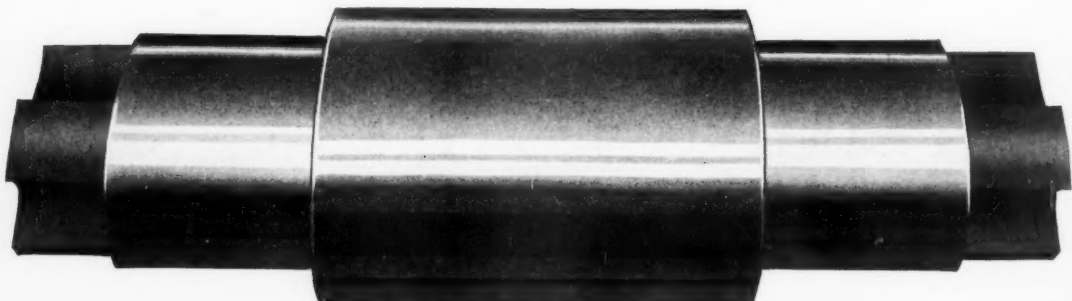
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Manufacturers Record

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APRIL 8, 1920.

Volume LXXVII.

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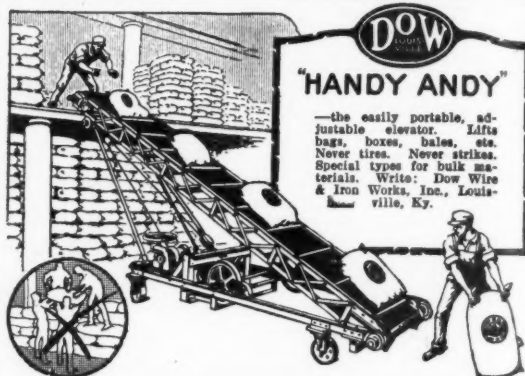
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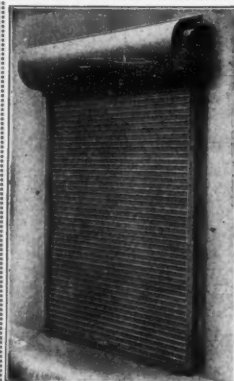
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Manufacturers Record

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of the South and Southwest as the Nation's Greatest Material Asset

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In order to avoid delays, all correspondence pertaining to news or advertising matters should be addressed directly to the Manufacturers Record, Baltimore, Md., and not to individual editors, officers, employees or any branch office.

TO RAISE BETTER COTTON.

PROFESSOR JOHN A. TODD, the textile expert of England, who is now in this country, in writing to the **MANUFACTURERS RECORD**, says:

"I wish I could persuade you to undertake a campaign for the development of improved cotton growing in the South as a whole. It is the one thing required now, and it would pay the South."

Professor Todd has in mind the growing of better cotton, and he is quite correct that this is most important. There is a very great difference in the importance of raising good cotton of long staple as compared with raising low-grade cotton of short staple. Not only does cotton need improved cultivation to a larger extent than it has ever received as a whole, but cotton growers need to study how to produce a better quality of cotton. The difference in price fully justifies giving particular attention to the betterment of the staple. Probably as much money is lost to the South by raising short staple where a longer staple could be produced as is lost by the barbarous system of compressing and handling of cotton.

MORE PATRICK HENRYS NEEDED.

MR. N. H. WRIGHT of Atlanta, Ga., in a letter to the **MANUFACTURERS RECORD** enclosing his subscription, says:

"This is and has been for the last six or seven years, to my viewpoint, the most un-American period since the days of Benedict Arnold. What we need mostly is 10,000 firm orators of the stamp of Patrick Henry and more men of the courage of Israel Putnam and the wisdom of Washington, Monroe and others too numerous to mention, and a swift kick in the slack part of the League of Nations."

And Mr. J. Edward Cassidy, Lieutenant-Colonel of Engineers, writing from Washington, says:

"Your articles on Americanism are to the point, and can be doubly appreciated by us chaps who bucked the Hindenburg line and several other lines of the same general brand in France."

SOUTHERN RAILROADS WILL STAND BY SOUTHERN PORTS.

MR. FAIRFAX HARRISON, president of the Southern Railway System, although declining at this time to commit himself further on the question of export rates, has reiterated a statement recently made by him to the Mobile Chamber of Commerce. He says, specifically:

"I am glad to reaffirm the statement recently made to the Mobile Chamber of Commerce, that when the export rate question is heard by the Interstate Commerce Commission you will find us there with every ounce of energy we have to resist the selfish proposal of the trunk lines that they shall be protected in a continuing monopoly of export traffic as against South Atlantic and Gulf ports."

Mr. Samuel Rea, in a letter published in our issue of last week, took the position that a railroad cannot determine the routes of freight shipments. It can certainly prevent the use of certain routes by the simple expedient of keeping rates on those routes so high as to make their use prohibitive, in a competitive sense. That is exactly what has happened for years in the case of the Southern ports.

Mr. Harrison is a railroad executive of broad experience and clear vision. He speaks of the "selfish proposal of the trunk lines" and their protection "in a continuing monopoly of export traffic." There is obviously no doubt in his mind that the trunk lines have been determining the routes of export movement.

The splendid ports of the South Atlantic and Gulf Coasts have been languishing for years. Dry-rot seized them. Their piers rotted and the value was kicked out of them. But in the stress of war the use of these splendid national assets became requisite. Moreover, the thrill of enterprise stirred the whole South. It is no longer content to be a doormat. It is crying out for an equal chance, demanding the right to live, asserting its privilege also to profit from its undertakings and insisting that the Government no longer permit its ports to be legislated into uselessness by selfish railroad edicts.

This new spirit in the South is slowly but surely actuating the managements of the various Southern railroad lines. They have begun to see that their future is not "where they ain't," but where they are. They no longer have to be mere feeders for Northern systems; they have their own assets to develop. They have, in fact, only begun to tap the reservoirs of traffic in their own territory. They know what the future holds, and they are not going to let that future get away from them by failure to safeguard it.

It is unfortunate, of course, that for so many years Southern railroads have neglected their obvious duties. Too often chambers of commerce and other bodies were left to fight alone the battles in which the railroads should have participated. But Mr. Harrison has set the pace for a new order of

things. The executives of other great systems will perforce follow his lead.

When Mr. Daniel Willard, in behalf of the Baltimore & Ohio and other Northern trunk lines, carries further the protest which he has already filed against the parity in export rates, he will find not only the South Atlantic and Gulf ports and the whole Mid-West territory presenting the case against him, but he will also find the Southern railroads lined up in their own defense. The South is not going to lose its patriotism this time by default.

The fact is—and it is being demonstrated more conclusively week by week—that America has ceased to be a one-port nation. There is business enough for all.

THE "COUNTRY GENTLEMAN" PERMITS A SLANDER TO BLACKGUARD THE SOUTH.

A FLORIDA paper criticizing the misstatements which have recently appeared in the correspondence of the Country Gentleman about that State, suggested that if Florida was carrying a large advertisement in the Country Gentleman these misstatements probably would not have appeared. This, we think, is as bad a blunder on the part of the Florida paper as the almost criminal blunder committed by the Country Gentleman for publishing such misleading statements as recently appeared in its columns. To suggest, as the Florida paper did, that any reputable paper is influenced in its editorial or news columns by its advertising pages is a reflection upon the honor and the integrity of the press. We hope that the Florida paper which made the mistake will frankly admit it and reply to the Country Gentleman in some other way more in keeping with the honor of newspaper work and the occasion itself.

We do not believe the Country Gentleman or any other reputable paper allows its editorial or news columns to be influenced or controlled by its advertising pages. It is absolutely inconceivable that such a thing could exist on the part of a paper of such standing as any of the publications issued by the Curtis Publishing Co. of Philadelphia.

On the other hand, it is equally inconceivable as to why the editor of the Country Gentleman permitted an asinine correspondent to attack the South in the manner recently done. The statements made in the article in question were wholly untrue. Their publication in the Country Gentleman was a disgrace to that paper and a reflection upon the intelligence of its editor. We far prefer to criticize his intelligence rather than his honor. And yet it is quite possible that the article in question may in some way have escaped the editorial supervision, and that it was one of those blunders which sometimes break loose in the best-regulated offices, but certainly the Country Gentleman owes to its subscribers an apology for the misinformation which it published, and it owes this to the truth itself.

The attempt to belittle the agricultural resources of the South in a publication like the Country Gentleman is unworthy of any reputable paper; especially is this true of a publication which is supposed to represent the agricultural interests of the whole country and not of a particular section. If the North and the West are so disturbed by the progress of agriculture in the South that they find it necessary to slander this section in order to keep their own people at home, let their own local papers do the dirty work if they have papers with so little honor, instead of permitting the columns of what should be a reputable national paper like the Country Gentleman to be besmirched by such slanderous falsehoods as those which appeared in its recent correspondence viciously attacking the soils and the agricultural potentialities of the South.

"THERE'S MONEY IN IT."

Editor Manufacturers Record:

Baltimore, April 3.

Your attention is called to the enclosed bulletin of the American Commercial Association, "to promote trade with Russia." This is an association of manufacturers, exporters and importers interested in Russian trade, recently organized in New York. There are at present about 1500 American firms anxious to sell their goods to the Russian Government. The Russian Government has about \$500,000,000 in gold in Moscow banks for international trade, and agrees to deposit \$100,000,000 in gold in New York to pay trade balances as between the export and import business of the two countries. It is stated that the trade is worth \$1,000,000,000 a year. Very large interests in the United States, it is learned, are pressing for the resumption of trade relations as between the two countries, but in this connection it might be well to state that American business men are not interested in the politics of Russia. If you are disposed to give your readers the facts of the business situation relating to Russia without prejudice, the association in New York will be glad to furnish you with their bulletins and any additional information that it can furnish you that they have from time to time.

W. E. BEVERIDGE.

What Mr. Beveridge calls "The Russian Government" happens to be an association of assassins and murderers. If they have 500 millions in gold, their title to it is the highwayman's.

"American business men are not interested in the politics of Russia." Neither were Russian business men, until they awoke one morning to find that politics had put them out of business. When a business man says he is not interested in Bolshevism he declares in effect that anarchy is of no importance to him.

We do not doubt that the Soviet regime is anxious to dispose of its reported vast hordes of raw materials. It does not own them. It is a kind of loot that it is profitable to sell, just as the exploiters found it expedient to send to Stockholm and there barter away the art treasures it pillaged from the houses of Petrograd.

To deal with the Russian people; the people who produce and own what they offer for sale, is one thing; what Mr. Beveridge and his associates apparently intend to do is to trade with the Soviet regime. They will not ask "Where did you get it?" but only "Have you got it?" Parlor Bolshevism is being succeeded by dollar Bolshevism. Yet it has been said that it would profit a nation nothing to gain the whole world if in so doing it lost its soul.

EVERYTHING IN MANUFACTURERS RECORD OPEN FOR REPUBLICATION BY OTHERS.

A CORRESPONDENT writing to the MANUFACTURERS RECORD from Shreveport, La., said:

"In talking with Mr. Stewart of the Pelican Well Tool & Supply Co. today, he mentioned how much he liked the front-cover editorials, and how he had made use of them. I told him of the company who used to cut them out each week and fasten them on their time clock so that the workmen had four chances each day for a week to see them, and he countered by saying he had written Bausch and Lomb, inquiring if there was some sort of a projecting apparatus he could procure that would enable him to show them on a screen direct from the front cover. He promised to let me know what he found out.

"Talking with W. K. Henderson, he spoke of his liking for the editorials, and I told him about the time-clock incident, and he countered by saying he had had various ones copied on typewriter and put into the pay envelopes week by week."

As we have repeatedly said, our readers are at liberty to take the front cover-page editorials or any other editorials in the MANUFACTURERS RECORD and use them freely, reprinting them in any form they desire, and all we ask in connection therewith is that they be accredited to this paper.

Time to Preach Optimism Instead of Pessimism

THE shortage of Sea Island cotton in this country has resulted in an enormous increase in importations of foreign cotton, especially from Egypt, Peru and even some from China. For the seven months ending February 29 the imports of cotton as compared with the corresponding period of the previous year was as follows:

IMPORTS OF FOREIGN COTTON, 500-POUND BALES.

Country of production.	7 Mos. ending Feb. 29, 1920.	1919.
Egypt	289,621	23,544
Peru	50,229	1,966
China	16,438	3,887
Mexico	58,543	40,839
All other countries.....	17,909	5,841
Total.....	432,740	76,077

During the same period our exports of cotton amounted to 4,439,568 bales, or a gain of 1,355,592 bales over the corresponding period of the preceding year. Of this increase 855,000 bales went to the United Kingdom, 206,000 to Germany and nearly 200,000 to other European countries.

Some days ago the MANUFACTURERS RECORD received from Governor George J. Seay of the Federal Reserve Bank of Richmond a letter calling attention to a circular issued by a Chicago bank in which the claim was made that there was a decrease in efficiency on the part of workmen as proved by cotton mills, which showed a smaller consumption of cotton per spindle than last year. In reply to this we wrote Governor Seay as follows:

"Acknowledging receipt of yours of March 13: I note the marked item in the circular of the National Bank of the Republic with which, however, I do not entirely agree.

"The consumption of cotton in American mills has been steadily gaining over last year; though not as rapidly as is desirable, still a considerable increase has been made. The statement made by the National Bank of the Republic of Chicago is quite incorrect, for during the last six months there has been an increase of 7 per cent in the consumption of cotton as compared with an increase of $2\frac{1}{2}$ per cent in the number of spindles. Thus cotton consumption is growing more rapidly than the number of spindles. In addition to this it must be remembered that there is a constant tendency to the spinning of finer yarns—in New England and in the South alike—and as the finer yarn work increases the amount of cotton consumed per spindle steadily increases. Therefore, if we take into account the tendency to the spinning of finer yarns the showing as to the consumption of cotton is even more favorable than the increase of 7 per cent as compared with $2\frac{1}{2}$ per cent in the number of spindles.

"During the six months ending with January the consumption of cotton in all American mills was 3,143,201 bales, showing an increase of 192,000 bales over the corresponding period of the preceding year. The number of active spindles in January was 34,739,071, or a gain of 872,000 spindles, the increase in spindles being, as stated, $2\frac{1}{2}$ per cent as against the increase of 7 per cent in cotton consumption.

"In studying the reports of bankers I am constantly finding that they are making statements such as that in regard to cotton consumption which are without any foundation in fact.

"Moreover, it must be remembered that in cotton mills there has been a shortening of the hours of labor. The cotton mill operatives during the war worked under the tremendous pressure of the times. Machinery was speeded to its utmost capacity. With a little larger pay and a little larger freedom it would have been only natural that there should be some let down in efficiency, but, on the whole, consumption

of cotton is, as shown by the figures quoted, considerably larger than it was a year ago, and the increase is much greater than the increase in spindles.

"In the matter of iron and steel production, though this industry is still tremendously hampered by inadequate railroad facilities, the output is steadily increasing and is getting up almost to the utmost capacity of the plants. It, of course, has not reached the nominal potential capacity of the furnaces and the steel works, and it never does under any condition, but it is getting back to a point where iron and steel is being made in enormous quantities. This has come about too in the face of the great shortage of coal, the disorganization in the coke situation by reason of Government action and the chaos produced by the strike in the steel industry, so that certainly it cannot be said that there is any lessened production in the iron and steel industry at the present time.

"In the same circular, if you will turn to the file which you probably have, you will note that the National Bank of the Republic brings out very strongly the great shortage of houses and office-room, facts which are daily impressed upon those who seek to rent dwellings or offices, and on this account the coming building season promises to be the most active the country has ever seen. As to the railroads it says: 'Their rehabilitation to normal standards of efficient service will shortly call for large quantities of equipment and supplies, the total volume of which it is expected will be several times as large as during the past year, when over a billion dollars was expended for those purposes.'

"The country needs to do a vast amount of work. It needs to build from 1,000,000 to 2,000,000 dwellings. It needs enormous railroad expansion, and all of these things will go forward just as rapidly as the bankers permit solid enterprises to be financed. Men who have had Government bonds have sought to use these bonds as collateral, or have used their money for carrying out such necessary enterprises, continuing their bond loans in the banks, and the money thus used has been used wisely, used for the benefit of the country, used for the purpose of bringing about increased production, and increased production you recognize is an absolute necessity. Because some men have been unwise and have over-specified or wasted their money in extravagance is not, I think, any justification for the views expressed by many bankers.

"Moreover, I cannot conceive that there are any conditions showing chaos and the destruction of the Government itself in violating the sacred promises made to the bond buyers. This matter is discussed in this week's issue of the MANUFACTURERS RECORD by a large number of leading bankers, some favoring the position of the MANUFACTURERS RECORD and some upholding the Federal Reserve Bank. I confess that some of the letters indicate an amazing short-sightedness and a narrowness of vision that ought never to have been shown by bankers."

It is an interesting fact that the February report of cotton consumption just issued shows a continuation of increased consumption of cotton by American mills, the gain for February being 83,299 bales, or nearly 20 per cent. Thus notwithstanding the pessimistic cry sent out by the Chicago bank and which had deceived Mr. Seay, cotton consumption is increasing much more rapidly than is the number of spindles.

It is well to look at the optimistic side of things and not always be preaching the pessimistic side, which many bankers seem to be doing at present.

THE MEXICAN AMBASSADORIAL FARCE.

WHEN Ambassador Fletcher, following the example of so many officials of this Government, acknowledged that he could no longer continue to be made a fool of, and resigned his duties in Mexico, it was fair notice to the American people that the case was hopeless, both as regards the handling of the Mexican situation by the Administration and as regards the possibility of securing any adherence of the powers in control at the Mexican capital to rational ways of dealing with international questions. Mr. Fletcher was a man of superior talent as a diplomat, a trained man, an honest man and a true patriot. He represented a type that has been rare in our history, one who had made diplomacy his life-work. He climbed up in the service; he was not a tyro. He understood the business of representing his Government before another. Because he did his duty in this post he was put in such a position that he would have to go on and stultify himself as a rubber-stamp ambassador or give up his career. It means much for a man to abandon the profession that he fitted himself to follow, and to which the best years of his life had been devoted, but Mr. Fletcher was so much a man and an American that he chose to resign rather than be made a fool of.

Next comes the appointment of another distinguished diplomat, Mr. Henry Morgenthau, not precisely the same type as Mr. Fletcher, but a man of experience in diplomatic work, and one whose idealistic tendencies have made him stand out as a philanthropist as well as a diplomat. He had handled a difficult situation in Turkey, where the Government was perhaps nearly as bad as that now existing in Mexico. Carranza was evidently puzzled at the appointment. Mr. Morgenthau was not a man to be trifled with, and being a good man he was likely to be intolerant of evil. This meant that Carranza would have to square himself against something different from conventional diplomacy, in which Carranza himself was a past master. It may have been to gain time that he entered a plea that Mr. Morgenthau was a friend of Mr. Edward L. Doheny, the great oil magnate. Such a plea should have been taken as an insult to this Government, because it signifies only one thing, which is offensive to every honest American, namely, that any person who was a friend of American investors in Mexico was thereby disqualified from being received as our representative.

The principle, maintained both by Mexico and by the Administration, has been that Americans have no rights of any sort in Mexico, and it is upon this assumption that Mr. Morgenthau was declared at first to be *persona non grata*, because friendship with Mr. Doheny would mean that he was not convinced that American dollars were unworthy of being protected in Mexico, as long as they were honest dollars. No one has ever been able to say that the money made by Mr. Doheny and his associates in the oil fields of the Southern Republic was tarnished coin. As a matter of fact this group of gentlemen is distinguished for high morality. One of the group, Dr. Norman Bridge, has been spending enormous sums in Mexico in purely philanthropic work, maintaining institutions for the rescue of poor children who would else have become outcasts. We believe that Mr. Doheny has also contributed largely to this work, for it seldom happens that these two are not connected in their enterprises.

However, it had to be shown that Mr. Morgenthau was not a close friend of these honorable gentlemen before he could be accepted by Carranza. This might be taken as a criticism upon the character of Mr. Morgenthau, which he will be obliged to live down. In fact, the next suggestion in the dispatch from Mexico announcing that the objection had been withdrawn, gave a hint that Carranza hoped through Mr. Morgenthau to obtain a withdrawal of the embargo upon arms—since the present Government in that country can sus-

tain itself in power only by a continuance of the bloody strife that has gone on so long and so hopelessly. In times past, when the experiment was tried of letting Carranza have arms to "pacify" the country, enough arms were sent to Mexico to equip ten times the number of men who have ever been enrolled in the Mexican army. It has long been the custom for the opponents of Carranza to join his army, obtain the rifle and cartridge belt, and presently desert. It is thus that the arms get across into the camp of the men who are trying to overthrow the autocratic power of the dictator from Coahuila. If we wish to prolong the decimation of the Mexican people, and the bloody sacrifice that has been going on for ten years in that afflicted country, we should lift the embargo. If, however, we prefer to make an end of the execrable Government that has harassed us so long and has so ruthlessly murdered our citizens, then we should make the embargo more strict, by land and sea, than it has ever been. We cannot believe that the philanthropic Mr. Morgenthau would lend himself to arming butchers.

Mr. Morgenthau won an enviable reputation for his firm Americanism as shown in his dealing with the Turk. He now has a more difficult task. Unless he is given practically a free hand he will find that the evil influences that have been operative at both ends of this Mexican muddle will react upon him and cause him grief. The fact that he is too strong a man to accept dictation to do what is not right, gives hope that at last a change in policy may be in sight. If fine-spun sentiment is used to blind him to his duty in defense of Americanism he will regret that he ever accepted this post, which, during the last seven years, has proven to be incompatible with the maintenance of the self-respect of any real American.

STAND TOGETHER.

THE expose by the MANUFACTURERS RECORD of the persecution by the Government of William J. Oliver of Knoxville has attracted very wide attention, and Mr. Henry M. Leland, one of the foremost manufacturers of Detroit, in a telegram, says:

"Would like to distribute widely your very strong article, 'The Amazing Case of William J. Oliver,' in your March 18 issue. Have we your permission to reprint in pamphlet form, giving you credit?"

It is well that business men like Mr. Leland should co-operate in defending in every way possible any man who like Mr. Oliver has been persecuted and attacked by the Government and by union labor leaders, and who has won an overwhelming victory against the Government's charges. Such men deserve public support, and the business men of the country need to stand together whenever a man who has been vigorously fought by radical labor unions and by the Government has proven his absolute freedom from every charge made.

PROHIBITION ENDORSEMENT FROM KENTUCKY.

Owensboro Ditcher & Grader Co.

Owensboro, Ky., March 29.

Editor Manufacturers Record:

We would appreciate very much receiving one or two dozen extra copies of your Daily Bulletin of the 26th inst. We are interested in the article "On Which Side Do You Stand?" We think we can circulate the above extra copies to a good advantage. We wish it were possible to place one copy in the hands of every man in the United States.

W. A. STEELE,
President and General Manager.

The Iniquitous Tax System Is a Grave Menace to the Nation

IT is related that the giant Gulliver, in the land of the Lilliputians, awoke to find himself completely harnessed and bound by the pygmies. His vast strength succumbed before the combined efforts of the little fellows.

There is no nation on earth so strong, no people so virile as our own. Magnificent as are the costs of Government, they would nevertheless not bear with staggering weight upon the country were it not that the method of imposition and the theory underlying it unite to make taxes a nightmare to the business man and everywhere to put the brakes on progress and industry.

It is a mere truism to say that the high cost of living is the most important of all present issues, in the viewpoint of the masses. To those who know, therefore, what a fundamental cause of the high cost of living is, there is something almost pathetic in the violent activities of the Department of Justice and its threats against profiteers. Palliatives are of mere occasional importance when a disease is striking so deep at the vitals of the nation.

Is this lancing with the windmills due to stupidity? Is it a fact that the doctors at Washington have failed utterly to diagnose correctly the disease and in good faith have reached the conclusion that opiates are the proper course of treatment? It is enough to make intelligent men weep when they find this great Government sagely informing the great public that the cheaper cuts of meat do not cost so much as the dearer cuts. Possibly before long bureaucrats will be loading the already groaning printing presses with announcements to the effect that coal for heating need not be used when the August sun has lifted the temperature to a hundred or more.

Then Mr. Mondell, speaking for the Republican majority in Congress, rushes into print to tell his fellow-citizens that "economy alone can avert a calamitous crisis." That is somewhat in line with the reasoning of those economists who gravely point out that by doing less business the country can get along with less capital.

The pygmies of negativeness have almost pinned the nation down.

The fact is that the country can readily pull the essential tax burden without being galled. But what it cannot endure is the payment of taxes when four-fifths of the levy goes into private pockets and only one-fifth into the public coffers. What it cannot endure is a system of taxation so intricate that none but experts can decipher it—and they cannot agree. When it is necessary to build up a new profession whose duties are solely to inform citizens what it is they owe the Government, and when honest men are held in jeopardy for years, while Federal auditors strive to discover if their returns were legal or fraudulent, it is time to ask seriously if the pygmies have not enmeshed the American giant and made him almost helpless.

It is not the money paid into the Treasury that makes the tax burden so overwhelming—it is the system under which the money is collected.

The excess profits taxes were conceived under pressure and formulated for an emergency. They came into being at a time when almost the entire industry of the nation was dedicated to Government employment. They had as their purpose the return to the Government of a large part of the money it itself paid out to contractors. This mutuality of interest, combined with an operative price-fixing program, robbed the system of its most iniquitous features, or softened them temporarily. But with the coming of peace and the

march toward normality, the system became at once as uneconomic as would have been the maintenance of the army at war strength after war had ceased. During the war, the Government paid high prices and took part of the resultant profits back into its own pockets. Now the people pay the high prices, but they take back none of the profits.

There is an army of intermediaries between the producer and the consumer. Each of them, virtually by mandate of the Government, must add to his commissions his toll of profit for the tax collector. And so, rivaling the fecundity of the rabbit or the guinea pig, the increment of profit multiplies and multiplies, until, when the consumer finally secures his article, it is encompassed with liens.

Astute tax-gatherers ages ago learned that it was wise to conceal taxation, and they did it by indirect levies. That was a good enough device, perhaps, when the masses were ignorant. But why should it be necessary in this age of enlightenment to multiply five times the burden of taxation in the belief that by naming it "high cost of living" instead of "taxation" the people will more willingly endure it?

It is estimated that it costs the people of the country at least one hundred millions of dollars annually merely to prepare their tax returns. That in itself would be enough to condemn the system utterly.

Yet, although there is almost unanimity among economists and statesmen that the existing taxation system is a creature of iniquity, a blight on prosperity and an unyielding menace to the integrity of industry, Congress sits tight, concerning itself, if at all, only with trivial features of the system, and the Administration, with equal complacency, wastes its time in high-sounding promises and futile efforts, which it knows aforetime will be futile.

Chairman Fordney of the Ways and Means Committee and Acting Chairman Watson of the Senate Finance Committee have agreed that a soldiers' bonus measure must be passed. They have agreed, too, that there shall be no bond issue, but that the whole cost of the bonus shall be paid by this generation, apparently within one year. To raise the money it has been proposed that the high rates for the year 1918 be restored, the immediate effect of which would be to drive the cost of living further skyward. Another suggestion is a levy on capital, under the guise of confiscation of war profits. A third suggestion is a general sales tax.

The theory of a sales tax has been tried. It is in operation now under the existing law. It is not only operating, but of all the taxes levied by the Government it is the most easily collected and the most easily borne. As automobiles leave the factory the tax on them is paid by the manufacturer and passed on to the consumer, the real payer. There is nothing intricate about it, no experts are required to determine the amount of the tax, there is no uncertainty, no feeling that years hence the Government may return and demand a readjustment, and the money flows—all of it—in a steady stream into the Treasury.

Already every consumer is paying a sales tax, although it takes the indirect form of an excess profits tax, and he is paying it from three to five times over. Is it not common sense to change this routine and make the tax direct, with the Government getting all of it?

What business men want is assurance. It is uncertainty that kills. A direct sales tax would give them that. It would take from the dishonest—unfortunately there are dishonest men—their excuse for pillage, but no good citizen would grieve on that account. It would also deprive the pro-

fessional tax experts of their jobs, but they are a parasitical growth and easily can be spared.

It is hopeless, apparently, to expect anything from Washington in this pre-election era, when politics is master of men's minds and the thirst for power dulls the impulses of patriotism. It is too much to expect that Congress, while providing for the soldiers' bonus should also revise the whole revenue law, wipe out the destructive system of excess profits taxes and stoop to mere integrity by substituting therefor direct sales taxes. It is the delight of statesmen to make simple things intricate. A simple tax bill would appall them. They detest the sunlight. But the situation has passed the point of choice. It has become a question of necessity.

The nation is famished for houses. The railroads are short half a million freight cars, and every building plant in the country working full time for two years can hardly make up the deficiency. Everywhere the demand for capital is enormous. America is ready to leap forward into such prosperity as no other nation has ever known, ready to leap and able to leap, strong, virile, magnificently equipped, but the tax system holds her in leash, saps her strength, weakens her courage, causes her to dread barriers easily overcome and magnify them into the appearance of Chinese walls.

The financiers wept, says Moreton Frewen, in 1896, at the prospect of a 50-cent dollar, and "today the skies are to fall because of a dollar worth 136 cents." There are men who fear prosperity. There are statesmen who speak, as Mr. Mondell does, from the vocabulary of gloom, overcautious souls whose eyes are dimmed by the glory of prosperity. They cannot understand how it is possible for the nation to do what it is doing. They have seen God's eternal hills and stood by His spacious oceans; they have heard His promises of a land of plenty; but when in the fulness of time nature and the progress of intelligence combine to pour the promised plenty into the land, they weep their tears of sorrow and they fill the atmosphere with their lamentations. "It is too good to last," they cry. "Let us go back into our huts while the sun still shines, for perchance it may rain."

If a wise man finds his overhead gutting his business, he does not call in his salesmen. He multiplies his turnover. If we need another billion or more for the soldiers, if it is going to cost us five billions a year hereafter to run the Government, we do not help ourselves by moaning and selling the old homestead to pay the debt. Not by a good deal. We simply "throw her into high" and pay our way by doing more. We do not, if we are wise, attempt to save at the spigot while the bung is out of its hole. We are not going to give up government because it costs something. The kind of economy we are going to practice is the economy of the oil can, the economy that cuts down friction and makes the machine efficient. The big and open bunghole is the taxation system. Once that is got out of the way and a simple system substituted for it, the task of collecting four or five billions a year in taxes will not appear to be so overpowering as some people imagine. They will be amazed, in fact, to discover that by direct payment of the tax more money will be raised and prices actually fall at the same time. Too good to be true? A carburetor improperly adjusted has been known to cut the mileage in half.

In order to punish "profit" the Government is penalizing the entire nation. It has succeeded at the same time in fattening the profiteer. He thrives while honest men writhe under the system.

There ought to be a revision of the revenue act now. If Congress adjourns without making the revision, the President should summon it to the task in an extraordinary session, even if it takes all summer.

EMPLOYERS AND EMPLOYEES MUST GET ON A FRIENDLY BASIS FOR BEST INTERESTS OF BOTH.

Baltimore, Md., March 24.

Editor Manufacturers Record:

I have been giving a great deal of thought to the unusual conditions which confront us at the present time relative to employer and employee.

This subject is being discussed pretty generally by business men with whom I come in touch, and many of them are in a quandary as how to meet the situation. In some business houses where they have had trusted employees, with the changed feeling on the part of employees it is hardly possible to realize the indifference and lack of attention manifested, as expressed to me by some of our merchants. What the underlying cause is no one seems to know, more than that it is in the atmosphere and is imbibed freely by men and, indeed, women in all walks of business life.

In talking to a proprietor of one of the largest department stores, he said to me it was pathetic to see how indifferent some of his employees are, even those who had served faithfully for many years, and possibly this feeling had been created by those of socialistic tendencies. I was wondering if a closer association with the employees would not be of advantage; that is, to take them more into confidence and let them feel that they are part of a successful working organization. In connection with this, I am reminded of one incident in the life of Mr. R. C. Hoffman when he was president of the Seaboard Air Line. I was traveling on a train of the Seaboard line some years ago when he was president. The train came to a stop and remained for something over a half-hour. I with others became uneasy and restless. No one seemed to know the trouble, so with some others I got out and walked up the track toward the engine. Preceding me a short distance was Mr. R. C. Hoffman, who was going in the same direction. When I looked at the end of the train I found his private car was attached. He went up to the big iron horse and called the dirt-begrimed fireman, shook his hand, and then did likewise to the engineer. I could but pause and think what a fine type of man he was, and attributed his success along these lines to just such kind consideration of others. I reminded him on one occasion of this incident, and he said he never wanted his employees, even the humblest, to feel that he was occupying such a high position that he could not be a friend, for he always had their interest at heart. And he said to me, "They are the men who make success possible." Just this little consideration was the keynote, he said, to the fact that on one occasion during one of the panics when money was hardly available, even if it was in the banks, some of his men came to him and said they would perform their duties even if they would not be paid a cent.

When Mr. W. W. Finley was president of the Southern Railway, in a conversation with him one evening I related this little incident and for the time did not think it made its impress, but several months after when I had the pleasure of meeting him at a convention in Atlanta he thanked me and said it had given him a different viewpoint which he had profited by.

Recently I have seen several copies of a very attractive semi-monthly paper published by the United Railways, which contains interesting information, pictures of employees, their wives and children, and I asked myself, "Why this expense?" but I can readily see the desire on the part of this corporation to show its interest in each member of its working force in order to get close to them. I assume that this has been a medium for cementing them closer to those who are in charge of the physical condition of this corporation. When employees can come in close touch with employers, it no doubt has a wonderfully stimulating influence, and the little lunch at the table often begets a closer fellowship.

I have been greatly interested in an organization which my son has had in several plants, called the "Welfare Association." About once a month they have an inexpensive lunch and are addressed by some important business man, oftentimes from other parts of the country, who talks on practical subjects, such as System, Business Approach and, last but not least, "Absolute Loyalty to Employer." I have often wondered if this would not be a good thing to adopt generally in business organizations, which no doubt would produce results, and would stir the employees to greater activities and let the loafer and time-server see there is no niche for him to fill. I think in many big organizations the time is so taken up with many details that this feature is entirely overlooked. I was wondering if the MANUFACTURERS RECORD could not start a series of articles on this subject, which might prove of incalculable benefit to the business interests of the country. Something has got to be done to overcome the present feeling; otherwise the business interests will become absolutely demoral-

ized. The question of the general development of business seems to play a small part in the business world today as compared with these more serious propositions which are coming up as regards employer and employee.

I remember a wealthy banker told me some years ago that shortly after he was married he had a fortune left him through inheritance, and it was his great desire to increase it. He made a slave of himself in working for himself, so that his good wife, not having the confidence and pleasure of his association, was taken sick, and when she was critically ill he then realized her physical condition and found she had galloping consumption. Her life was wrecked because of the thought that he was treating her indifferently, feeling that he had made a mistake in his marriage relation. He said when he provided the means to send her away to a health resort to recuperate her health and strength, he told her how he loved her and how he wanted her to hurry and get well, and in the saddest tone of voice she asked, "Why did you not tell me these things before, for I had no idea that you appreciated me, and that has been one of the reasons for my loss of health." So I think that in these big organizations if we could have the heads of them show the milk of human kindness to those who are under them, it no doubt would be a help in the long run.

In talking with a gentleman in Atlantic City during the summer about group insurance, he said that little "nicety" on the part of employers in some institutions had changed the whole atmosphere and had cemented the men and women closer to the organization than ever before. So it looks like some of them are feeling that those whom they employ are made of the same material as those who employ them.

I do not want to burden you with such a letter, but these things have been on my heart for some time, and I thought I would communicate them to you.

The foregoing letter raises the question which many employers have been considering, but which all must study more carefully than they have done.

Here and there are to be found employees just as faithful, just as earnest and sincere in all their work, as any employees ever were. Many of the workmen of all classes are just as honest in their work, just as faithful, as workmen ever were; but there is to a certain extent abroad throughout the land a spirit of unrest. Many people are thinking that there is something the matter and that in some way they are not getting a fair, square deal, and the Bolshevikic, Socialistic movement, one of the emanations of the devil, is, like the work of the devil, spreading throughout the country. It spreads like some malignant disease. Men seem to absorb it without comprehending the reason therefor. It is a mental disease and likewise a spiritual disease. It can only be counteracted by mental and spiritual treatment.

Upon the employer rests a very great responsibility, not merely as to his own business, but as to the welfare of the world, to do all in his power to bring about a better understanding between himself and his employees. Absorbed to the last ounce of mental and physical strength in his part of the managerial work, the employer often forgets or overlooks the little things which count for so much in lessening the burdens or increasing the comfort of the employee.

Many employees feel that their employer takes no particular interest in their individual welfare, and that all that he is concerned about is in having the work done. The little things which count for so much in life, business as well as domestic, often mean happiness or misery, success or failure.

The reference in this letter to Mr. R. C. Hoffman, a former president of the Seaboard Air Line, a man of large wealth and of superb character, showing how he was on the friendliest terms with the brakemen and the engineers and the firemen on his road, might be matched probably by other railroad men. It was certainly matched in the case of Mr. Henry M. Flagler, the builder and the owner of the Florida East Coast Railway. Some years ago the writer spent a day and night on Mr. Flagler's car in company with Geo. W. Perkins, then representing J. P. Morgan & Co., and Henry Walters, controlling owner of the Atlantic Coast Line and the Louisville & Nashville Railroad, and Michael Jenkins, then one of Baltimore's foremost

financiers and vice-president of the Atlantic Coast Line. During the day, when the party was making an investigation of the great construction work of carrying the Florida East Coast Railway over the keys to Key West, the special train had to stop a good many times for investigations by the financiers who were making a study of Mr. Flagler's enterprise. Mr. Flagler was at that time about eighty years of age. He complained of failing eyesight, and yet at every station where a stop was made he got out, walked around the depot, shook hands in the most friendly personal relation with firemen, brakemen, engineers and others who might happen to be about and in the employ of his road, not with any air of condescension, but as though they were personal friends. Half a dozen times during the day the flagman had to be sent back to warn coming trains. Without waiting for the porter to open the trapdoor on the platform in order to let the flagman get back into the car, Mr. Flagler in nearly every case went to the platform himself and opened the trapdoor merely to make it a little easier for the flagman to get on board. He did it as though it was a perfectly natural thing, and to the brakeman and engineer and the fireman and the conductor he was just as thoughtful and courteous as he was to his guests. Judging by his actions, no one could have told to whom he was paying the greater attention, the guests who were with him or the employees who were in and about the train during the twenty-four hours the writer was in his company.

If a man of Mr. Flagler's vast wealth and enormous business interests and at his age and with his failing eyesight could find time to show these little attentions and courtesies to his employees, surely his example could to some extent be followed by everybody. We are all too apt to be thoughtless of the things which count for so much in life, the things which make or mar life, and the things which leave a sting or a pleasant recollection.

The suggestion of our correspondent should be taken very much to heart by every employer, and in some way every business organization should find a means of creating a personal acquaintanceship and a spirit of personal friendship between the employees themselves and between the employees and the employers.

A 100 PER CENT COTTON MILL DIVIDEND.

MRS. R. L. SEAY of Jackson, Miss., in a letter to the MANUFACTURERS RECORD says:

"I do not think your magazine is very generally read by women, but I have enjoyed reading it for a good many years, and find as time goes on your magazine grows better.

"I have been very much interested in the many articles and letters on the subject of the 'poor farmers' throughout the South and their profiteering (?) on the price of cotton during the past 20 months, and their dereliction of duty in their efforts to decrease cotton acreage and the production of foodstuffs.

"This leads up to the point of my letter. I went to purchase a pair of overalls for a 7-year-old boy this week and, after finding that size, was charged \$1.50 for them. On the next day I saw the enclosed clipping from one of the daily papers.

"This manufacturing company is well known throughout the South, as its products have been used here many years by all of us, and they make good stuff, too, but a 100 per cent dividend is going rather strong, it seems."

The clipping which Mrs. Seay enclosed was a dispatch from Boston announcing that the Amoskeag Manufacturing Company of New England had just declared a stock dividend of 100 per cent. No wonder Mrs. Seay thinks that a dividend of that amount is going a "little strong" in view of the fact that a good many New England and, indeed, a good many cotton goods consumers generally have been denouncing the farmers of the South for the price of cotton and entirely ignoring the fact that the cotton goods manufacturers are the ones who have been making the chief profits.

SAMPLE WORK OF LIQUOR TRAFFIC TO WHICH SOME PROFESSED CHRISTIANS WOULD AGAIN GIVE POWER TO DESTROY MEN'S SOULS.

A LEADING business man of Minneapolis, in a letter to the MANUFACTURERS RECORD, enclosing a copy of a recent editorial in behalf of prohibition, writes as follows:

"Referring to the enclosed clipping from the MANUFACTURERS RECORD, I want to say that from infancy till I left home to go to college my life was darkened with the liquor curse, and at 16 I took care of a half-brother through the delirium tremens, and at another time, under the doctor's care, when this half-brother was terribly burned from liquor causes, I had to dress the terrible sore every day, when every one but the doctor turned away in horror, and the doctor only looked at the sore once a week.

"This man was one of God's noblemen when not in liquor, but he was brought up in the idea that 'father is rich and I don't have to work.'

"Later he took his own life.

"I hope your activity will never lessen in the campaign against this evil of evils.

"Your journal has two uses in my home—one, for information on the great affairs of business and, secondly, for its high ethical and moral pronouncements.

"Your statement of the demand for old-time religion is greatly appreciated by my wife, who took it to the minister of the largest Presbyterian church in this Central Northwest, and he gave your ideas by name, and with high commendation, in his sermon."

There is probably not a single reader of the MANUFACTURERS RECORD who could not of his own personal experience tell some incident matching that of this Minneapolis reader. The curse of the liquor traffic has blighted millions of homes, directly and indirectly.

One little illustration of how in one way or another it has come into nearly every life may be illustrated by personal experience. Thirty years ago, a brother of the writer, and at that time one of the owners of the MANUFACTURERS RECORD, was living in an Alabama town for his health. He was one of God's noblemen, and he knew not fear. The town was under prohibition regulations, but the liquor interests were fighting to get possession of it. They had corrupted the police force, and they were doing all in their power to fill the town with "rot-gut" whiskey. He made a vigorous fight in behalf of the enforcement of the prohibition law to the point that he aroused the bitter hostility of the whiskey element, which openly boasted that it would kill him or drive him out of town. Several of them one day jumped on him as he left his hotel and beat him up rather badly before he could be rescued. He immediately made his fight against the whiskey element still more vigorous. A few days thereafter three of them entered his office claiming to be unarmed, but finding that he was not armed, one of them put a pistol within a few inches of his face and pulled the trigger, but providentially the cartridge did not explode. A second cartridge did, however, explode, and though the bullet had been intended for his heart, it struck his left arm and broke it, cutting an artery and for hours endangering his life. In the office was a visitor and a young boy, neither of whom had been in any way interested in the controversy, and the shooting had been so sudden that they had not had time to get out of their chairs. The whiskey scoundrels thinking that they had killed one man apparently, desired to kill the witnesses, and shot both the man and the boy. They lived for some months, but eventually died as a result of the murderous work of these whiskey scoundrels. Before the men could get out of the building they were captured and the crowd wanted to lynch them, but the man they first sought to murder, then uncertain as to whether he would live or not, begged that the law should take its course, and so the lynching bee did not come off. The men were sent to jail, but promptly released by political influences on a small bail. Again and again the time was set for their trial, and again and again

the trial was postponed and the men have never been tried for their crime, always through political influence being able to escape trial. Perchance they may be all dead and in the land to which their lives were dooming them.

That is a sample of what is constantly going on in this country in the work of the liquor interests.

Another case brought to mind by the letter of our Minneapolis subscriber is that of one of the most brilliant men, brilliant as a writer, brilliant as a business man, brilliant in education, whom the writer has ever known. He could meet and mingle on the friendliest terms with the most highly educated men in the country and with equal friendship meet the man from the backwoods or the veriest clodhopper. His acquaintance was the largest of any one man we have ever known, but occasionally the overpowering influence of liquor got possession of his brain and soul and for weeks he would be in the possession of the demon, literally possessed of the devil. When sober he fought this spirit of evil with all the power at his command. Some times it seemed that he would conquer, and he would go for a year without touching liquor, and then without a warning to himself or his friends the accursed spirit got possession of him. A man of wonderful genius, wonderful loveliness, brilliantly educated, died long before his time because of the accursed power of the liquor traffic, and he was but one of thousands and tens of thousands and hundreds of thousands and millions whose lives have been wrecked by the power of the liquor business. And yet there are some men who profess to love humanity, even some who profess to be Christians, who dare to flaunt in the face of Almighty God their demand for the repeal of the prohibition act!

THE EFFORT OF LIQUOR INTERESTS AS VIEWED BY A TEXAS CONGRESSMAN.

House of Representatives.

Washington, March 27.

Editor Manufacturers Record:

I am just in receipt of the Daily Bulletin issued by your magazine on Friday, March 26, in which is contained an editorial "On Which Side Do You Stand?" and which editorial relates to the effort of the liquor traffic to secure another breathing spell. I indorse what you have to say in this editorial.

There has been a great deal of agitation along the line of inducing the Democratic party at its San Francisco convention to declare for a more or less lax enforcement of the prohibition amendment. As a life-long member of the Democratic party, I do not subscribe to any such view. Democrats are not nullificationists. It is entirely within the rights of Democrats to advocate the repeal of the Eighteenth Amendment in the ordinary way, which would be for Congress to submit the matter again to the States and then three-fourths of the States vote for its repeal.

I do not expect any such action to be taken. But, of course, I recognize that it is entirely within the rights of any Democrat to advocate it, but certainly so long as the Eighteenth Amendment remains a part of our organic law, we must stand for its effective enforcement. It is inconceivable to me that the Democratic party would take any other stand in the matter.

EUGENE BLACK.

"CALL" MONEY OBSOLETE?

SENATOR OWEN, the financier of the Senate, recently suggested that the system of call money as in vogue in New York is obsolete, out-of-date and without any reason whatever for existence. If this is true, why not do away with it?

The Nation Needs an Agricultural Policy

IT is understood that a chief purpose of the new Secretary of Agriculture is to popularize the department. He wants the nation to know what it is doing and why it is valuable. That is a laudable purpose and we wish it success.

But agriculture in the United States must itself be popularized, not merely the department which the Government has instituted to keep a watch over it. It is unfortunately true that for more than half a century there has been no such thing as a national agricultural policy. Before the Civil War there was a political group which was agricultural in thought and purpose. It protected agriculture in Congress and saw to it that there was such an adjustment of interests that neither manufacturing nor farming was the recipient of undue favors from the Government. But it was a group that was sectional, and the war wiped it out. This left the field clear for what are termed the industrial interests, and it is not an exaggeration to say that for half a century the manufacturing industry has dominated the policies of the nation.

The same course was followed in England, where agriculture was all but wiped out; but in France a contrary policy was followed. The world may be grateful for it, since it was the French peasant, owner of the land he loved, that breasted the Hun tide and held it back until the rest of the world could make ready.

For years this nation insisted that the cotton crop should be sold at ridiculously low prices. It was cotton that was maintaining the balance of trade, it was with cotton that we were paying the interest on our debts abroad, and yet the strange fallacy persisted that it was not of interest to the nation as a whole to see to it that the cotton producer received a fair price for his product. How many billions of the national wealth were simply tossed away by this policy it would be hard to estimate, but the total must have been enormous.

For years the Western mortgage was a joke in the comic papers, but it was no joke to the mortgagors. They toiled and sweated in the sun, but the fruits of their labor went into other pockets than theirs. It came to be accepted in the cities that it was the natural lot of the farmer to be a beast of burden, that poverty was his destiny, and that he ought to be content and thank Providence that he was permitted to live. And even unto this day that fallacy has persisted, so much so that fat city dwellers can be found in numbers now who denounce the wheat-producers as profiteers and vent their spleen in bitter denunciation of the cotton growers. So long does it take for the worm to turn!

The trouble throughout has been the refusal on the part of the Government to protect its farm assets. It has protected industry and by wise policies has enabled our manufacturers to build enduringly. But the cry of the farming element, unfortunately, too often was turned by scheming politicians into a pursuit of economic fallacies. Instead of uniting to develop a powerful voice in Washington that could speak out in favor of sound fundamental principles, the farmers tied themselves to a series of isms, none of which embraced any fundamental or had in it the nucleus of a lasting and beneficent program.

Moreover, it is a black eye for the agricultural interests that today there are a number of so-called agricultural bureaus in Washington, some of them manned by professional farmers, which spend their time trying to form alliances with union labor politicians and exert themselves otherwise in misrepresenting the element for which they are supposed to speak.

One of the first essentials in putting agriculture back

where it belongs in this country is an educational campaign to show that the farmer is just as much entitled to profit as anybody else. It is time to disabuse the public mind of its delusion that every farmer is a hayseed and that every hayseed ought to be an economic slave.

The next thing is to bring Washington to an understanding of the fact that the nation's farms are still far and away the greatest asset the nation has, and that it is just as essential to be concerned about the farmer getting a good price for his crops as it is to see that the union workman gets so many dollars for eight hours' work, together with compensation insurance and a multitude of other benefits. The business world rejoices when American steel is sold for a good price in Argentina or anywhere else, and the business world should rejoice equally when American cotton or American wheat brings a price in foreign markets that enables the producer in this country to earn a reasonable profit.

Down in Texas some of the oil mills are quite jubilant because they have discovered that they can bring in peanuts and soya beans from the Orient at a price lower than that reigning in the American market. They say they are going to import great quantities of these oil-bearing materials. The American farmer is just as much entitled to protection against the cheap farm labor of the Orient as the American manufacturer is against the pauper labor of Europe. If Chinese peanuts can beat American peanuts down to the point where the American can no longer compete and earn a decent profit, there ought to be a tariff on Chinese peanuts, and it ought to be a stiff one.

The case is merely typical. A year ago, for instance, Washington permitted the British to unload great quantities of Egyptian cotton on the American market, with the result that American high-grade cottons were depressed in price until they sold below cost of production. Yet all the time the Government was withholding from the market great quantities of its own war materials in order not to break prices. That is the kind of treatment the farmers have been getting from Washington right along for more than half a century. That is why they need group representation at the Capitol. They have been neglected because they permitted themselves to be neglected.

The boll-weevil has cost the nation hundreds of millions or even billions of dollars, but whenever it is proposed in Congress to appropriate a few millions with which to combat the pest, there is an immediate protest from Senators who have been taught from infancy to believe that no farmer is entitled to any consideration.

There would be plenty of money available for fighting the boll-weevil and the corn-borer and other destructive agents if there were groups in the House and Senate definitely committed to the protection of the agricultural interests of the United States.

Today the factories are robbing the farms. There is no equality of attraction in wage or hours. Men who labor long and sweat much in the open fields can make far more money by laboring little and sweating less in the manufacturing establishments. So they go to the factories. The drain is a steady one, so steady that already it threatens the nation with an absolute food shortage. As a people we are getting perilously near the rocks, and we are going to run afoul of them unless we turn honest and give the toiler in the fields a fair show.

We suggest to Secretary Meredith that he do not content himself merely with popularizing his department. We have noticed, too, on the part of his subordinates what seems to be a tendency to assume an apologetic attitude when stating the case of agriculture, as if the farmers were asking some

favor of the nation. They have no need to ask for favors; it is their duty to demand their rights. We should like to see Secretary Meredith trumpet from one end of the country to the other the simple truth that the farmers are not profiteering; that they are not even getting as yet a fair return for their toil; that it is their Government as much as it is the Government of any other set of laboring people, and that they expect to get a fair deal from now on or know the reason why.

Under his wise direction the Department of Agriculture is sure to become popular, but what Secretary Meredith has to do also is to bring agriculture back to a parity with other industries; to make it as attractive as are other fields of endeavor.

We hesitate to say so, but the fact is that not a single one of the Presidential aspirants seems to have the slightest apprehension of what the agricultural problem in this country is. Most of them have something to say, but it is the merest slush. They talk about "nothing must be permitted to interfere with ample production," and concern themselves mightily for fear the cities may not have enough to eat, but none, so far as we have been able to discover, has made even one intelligent statement which has the farmers' necessities in mind. It would be no less a relief than a surprise to see some one of these major statesmen boldly announce what is only the truth, namely, that the wheat-producers have not been getting too much for their wheat and that cotton at 40 cents or more is a national blessing, not a national calamity.

We hope no man will be elected President of the United States whose heart and mind are not devoted to the improvement of the farmer's condition and the protection of him by definite national policies, deliberately formulated and adopted. It is in the hands of the farmers, whatever their political convictions, to insist that the great industry of which they are a part be given that consideration by the Government which it deserves, and which it must have if the prosperity and well-being of the nation are to be preserved and magnified.

The way to change the urban inrush into a rural exodus is to let the farmer also make a little profit.

A PANEGYRIC TO THE MULE—WITHOUT THE MULE CIVILIZATION WOULD SINK INTO BARBARISM!

IN reply to a schoolboy's request for some information about mules, so universally used in cultivating cotton, Mr. J. S. Wannamaker, president of the American Cotton Association, poured forth his soul in a tribute to the mule, the lowly, long-eared, hard-kicking animal, of which it has been said, "he has no pride of ancestry and no hope of posterity." In this panegyric to the mule, Mr. Wannamaker said:

If you refer to the mule that we buy in Missouri and Kentucky, and which we have recently learned to raise in the South under our program of diversification in farming, then you refer to an animal that did not exist at the time of the Ark, and evidently due to the fact that he is unable to trace his pedigree back to the misty ages of the past he frequently expresses his regret in a sound that it is impossible to imitate and extremely distressing to hear; however, he can console himself with the fact that Balaam, of Biblical fame, rode one of his paternal ancestors, and doubtless he has maternal ancestors back to the famous team driven by Ben-Hur in the chariot race.

Without the mule we cannot make cotton, so that he performs a wonderful service. Cotton clothes nine-tenths of the world, brings the balance of trade to America and maintains our gold reserve. Without the mule we could not cultivate the soil of the South at all. The South has recently made tremendous strides in the production of her crops, so that without the mule almost the entire fertile section of the South would be uncultivated; hence, on one side the mule is an aristocrat, regardless of the fact that he cannot trace his ancestry back to the time of the Ark, and on the other side he is a philanthropist, furnishing clothing and food to the world. He is also a great financier, furnishing to America, as

stated above, the balance of trade and her gold reserve. Without the services of the mule, England would perish, the financial fabric of England being dependent on cotton and the production of cotton dependent on the mule.

While the mule has many valuable points and appears to be very docile, he carries with him a kick almost as deadly as a Gatling gun, and if we could have legislation passed which would force the unnecessary middlemen who stand between the producer and the consumer to stand for a few seconds in the rear of the mule he would bring tremendous benefits to civilization by kicking them into the next world, and I am strongly inclined to think that it would be the lower world.

The mule, or his ancestral foreparents, received more Divine attention than any other known animal. He is the only animal ever used for the purpose of performing a miracle, and strange to say as the result of the question he asked he actually forced man to think. It is a great pity that he could not again today be endowed with the power of speech. I feel convinced that he could give some very valuable advice to some of our statesmen, both national and local; in fact, I believe he could give valuable advice to the entire human race. I often give advice that I afterward find out was far from correct, much more incorrect than that a mule could give were he able to speak.

The mule was the greatest honored of all animals. Christ rode into Jerusalem on one of the paternal ancestors of the mule. If God were again to use the mule for the purpose of asking questions and would endow him with power of speech, I feel sure one of the first questions he would ask would be: Why have we not on earth today peace and good-will toward all men? He would also ask: Why is it today in our educational institutions of this great nation we have failed to teach to our boys and girls the commercial side of life in all of its branches, including the business side of production? Why is it that we have these uneconomical conditions in the handling of our products? Why is it that the producer fails to receive a profit that will enable him to improve rural conditions so as to make them attractive and draw to the rural sections and to the greatest of all professions—agriculture—a tremendous increase in our population? He would also doubtless ask: Why have we not unrestricted commerce, man with man, nation with nation; this was intended by God when he created one section to produce one crop and certain minerals and another section to produce another crop and certain minerals. He would certainly ask of certain idle people why it is they are not busy, and he would ask, Why is it that two thousand years after the birth of Christ, the man of Galilee, the greatest of all teachers, left this world, we continue to have wars; continue to have conditions that should have been blotted out by good men, united to change conditions from what they are to what they should be? He would ask of the idler, Why is it that you do not work? The mule would say:

"We have now arrived at a period when we have decided that idleness is not only a disgrace, but a crime, and a very dangerous form of immorality."

He would ask:

"Do you realize that God is a worker? That He has thickly strewn infinity with grandeur. God is love; He yet shall wipe away creation's tears, and all the worlds shall summer in His smile. Why work you not? The veriest mote that sports its one-day life within the sunny beam has its stern duties."

He would ask:

"Do you realize that you pass this way but once; your allotted time is threescore year and ten; that this is but the kindergarten of your existence, and that life goes on until Death accomplishes the catastrophe in silence, takes the worn frame within his hand, and, as if it were a dried-up scroll, crumbles it in his grasp to ashes. The monuments of kingdoms, too, shall disappear. Still the globe shall move; still the stars shall burn; still the sun shall paint its colors on the day and its colors in the year. What, then, is the individual, or what even is the race in the sublime recurring of Time? Years, centuries, cycles, are nothing to these. The sun that measures out the ages of our planet is not a second-hand on the great dial of the universe."

TO BE PITIED.

Jackson, Miss., March 26.—Addressing a joint session of the Mississippi Legislature today, Senator John Sharp Williams declared it "was the deliberate purpose of those who fought ratification of the peace treaty to protract the illness and bring about the death of President Wilson."

Is there no institution in Mississippi to which Senator Williams will retire until an overheated brain permits him to see things in a little clearer light?

The Only Sure Remedy for the World's Turmoil

IN August last the MANUFACTURERS RECORD published an editorial entitled, "Am I My Brother's Keeper?" which has commanded wide attention among business men in all parts of the country, and which has been read from hundreds, perhaps thousands, of pulpits. It was as follows:

AM I MY BROTHER'S KEEPER?

"Above all else this country needs a nation-wide revival of old-fashioned prayer-meeting religion—

"A religion that makes men realize that if there is a Heaven, there must also of necessity be a Hell—

"A religion that makes a man realize that every act is recorded on his own conscience, and that, though that may slumber, it can never die—

"A religion that makes an employer understand that if he is unfair to his employees and pays them less than fair wages, measured by his ability and their efficiency and zeal, he is a robber—

"A religion that makes an employee know that if he does not give full and efficient service, he, too, is a robber—

"A religion that makes a farmer who packs bad fruit at the bottom and deceives the buyer by the good fruit on the top realize that he is a thief just as much as the one who robs a hen roost at night—

"A religion that makes a man who robs a railroad of its fare, or its freight bill, know that he robs himself of all right to feel that he is an honest man—

"A religion that makes a man realize that by driving too hard a bargain with his servant, his employee or his merchant he can be just as much a profiteer as the seller or producer who swindles by false weight, false packing or false charges—

"A religion that will teach church members who fail to contribute to the extent of their ability to the support of religion, and that compels them to recognize that if they are paying their pastor less than a living salary, they are robbing God and man alike—

"A religion that will make the laboring man who, by threats or by actual violence against the non-union man, strives to keep him out of employment realize that he is at heart a murderer and is murdering the individuality and the liberty of his fellow-man, and is displaying a hatred which, if it has the opportunity, will commit physical murder—

"A religion that will make the politician who yields principle for the sake of party, who worships at the feet of any class and sells his soul for political preferment know that he is not only a coward and a poltroon, and unworthy of the respect of any decent man, but which will also make him see that he is helping to murder human liberty, as great a crime as murdering the individual man—

"In short, we need a revival of that religion which will make every man and woman strive in every act of life to do that which, on the great Judgment Day, they will wish they had done, as with soul uncovered they stand before the Judgment Seat of the Eternal.

"Until the people of this nation accept and live this religion there will be strife where there should be peace, there will be strikes and lockouts and murder where there should be co-operation and harmony, there will be hatred where there should be friendship and love.

"In the Golden Rule, followed in the fulness of the spirit of this kind of religion, there would be found a solution for every business trouble; there would be created friendship between employer and employee; capital and labor would work in harmony and with efficiency, efficiency for the capital and efficiency for the labor, with profit to both.

"Religion of this kind is not measured by the hope of a Heaven hereafter, but by the full fruition now of 'Peace on earth to men of good-will.'

"It is not merely the chanting of hymns here or in the world to come, but it is in the recognition and full application by rich and by poor, by learned and unlearned, that each one is indeed his brother's keeper, that we can bring this country and the world back to safety.

"A nation-wide acceptance of this, the only true religion in action, would bring business peace and world peace where there is now turmoil, and men would then cease to seek to gain their aims by lawless acts of immorality, but would in spirit and in deed follow the Divine command, 'All things whatsoever ye would that men do to you, do you even so to them.'"

The doctrine taught in the foregoing editorial has been illustrated in a most amazing way among industrial workers and business men in Wheeling and elsewhere as told in the

Literary Digest of April 3. The story is so significant and so suggestive of the way men of all classes are thinking about the way to solve the turmoil and labor unrest questions of the hour that we give it in full as follows:

INTRODUCING CHRIST INTO INDUSTRY.

"Take your troubles to the Lord—He's your Big Boss," was the counsel recently received and acted upon by a body of mill workers in Wheeling, W. Va., who were on the verge of going out on strike, and in Cleveland, O., a dispute between Swift & Co. and 550 packing-house employees was settled after the strikers and the management of the plant had listened to a homily on the love of God and the necessity of returning to His teachings by John J. Walsh, Conciliation Commissioner of the United States Department of Labor. "We must get back to God's teachings, and must have brotherly love in our hearts to make the world's great undertakings go forward," exhorted Mr. Walsh. In the West Virginia town application of the principles of the Sermon on the Mount to the solution of modern industrial problems has been suggested to the Ohio Valley Trades and Labor Assembly by Will H. Colvig, a locally prominent business man known as the "peacemaker," and that body has definitely endorsed the teachings of Christ as a platform on which both capital and labor can meet and agree. Mr. Colvig has been successful in many instances in settling labor troubles to the satisfaction of both employer and employee, and on several occasions he has found a Scriptural truth coupled with a mild exhortation to be sufficient to persuade an agitator to turn from his self-appointed mission of stirring the ashes of discontent. The Golden Rule often has been suggested as a means toward bringing capital and labor to a common understanding, but in Wheeling and its vicinage it seems for the first time to have been put into practice with effective result. There it is planned to rely on this principle and on the virtue of brotherly love to compose all the differences which may arise between employers and the workingmen. The local press generally agree that the Christian doctrine may be found to be permanently practicable, and one paper suggests that its local enunciator be placed on the next Federal Industrial Commission. The resolutions adopted by the labor assembly announce:

"First, Be it hereby resolved, That we, the duly elected delegates representing all of the organized crafts of the Wheeling district, do hereby unanimously declare it to be our belief that the teachings of Christ constitute a platform upon which all men can agree.

"Secondly, That we believe they can be applied to modern industrial problems.

"Thirdly, That we will co-operate with those who will join with us in an earnest endeavor to apply His teachings in the Wheeling district.

"Fourthly, As further evidence of our sincerity we have duly appointed a committee of three to confer and decide what methods shall be pursued."

"The local and neighboring labor press warmly commend the movement, the Columbus (O.) Labor News remarking:

"This is perhaps the first time that either capital or labor has gone on record officially indorsing the teachings of Jesus Christ. And yet it is simply the fundamental principles of the great A. P. of L., namely, the second commandment as taught by Jesus, 'Thou shalt love thy neighbor as thyself.' On such a stand labor and capital would have no trouble to get together and with the principle carried out by labor, capital cannot resist the influence and would have to make conditions right both of wages and hours of employment because the public would not stand for them to do otherwise. We commend the Wheeling Central Body for their stand on the teachings of Jesus Christ, and know with such teachings carried out in spirit and practise they will win."

"The Wheeling News thinks:

"Criticism of such a movement will come only from communists or soviets, and fortunately few of them are found in Christian institutions. The principle of 'doing unto others as you would be done by' is a pretty good one to follow and its observance would tend to remove many difficulties, industrial or otherwise, and a little closer attention to the principle of Christianity in our daily life would make a world of things look brighter."

"Opportunity to test the practicability of the Christian principle in settling labor disputes is now presented in the strike of the teamsters in Wheeling, who are demanding a minimum wage of \$24 a week. They are having every morning religious services conducted by a regularly ordained minister. 'They have to strike because the employers will not act as their brothers' keepers!' says the Wheeling Majority, official labor organ and the only labor paper in that section of the Ohio Valley, reminding its readers that 'on the theory that ye are our brothers' keepers, we have in Wheeling today at least 32 churches, worth more than \$3,000,000, maintain upwards of 50 salaried ministers and other

church workers with an annual payroll of \$100,000, and pay out every year, to keep the churches comfortable, another \$150,000.' Continuing:

"The teamsters are more consistent. There are a few highly-paid men among them—one or two who receive \$40 a week; but they have gone to the aid of their brothers who receive less than \$24; they recognize that they are their brothers' keepers!

"The employers have been going to church on Sunday and singing their psalms, and, if they thought at all about such a secular thing as the wages of their workers, they have dismissed the teamsters from their minds as 'rough-necks,' men outside the pale of consideration; thus violating another express command of the leader in whose teachings they have built \$3,000,000 worth of churches and are spending \$250,000 a year, \$20,830 per month, \$231 per eight-hour day, \$28.93 per hour, about a half a dollar a minute!

"The teamsters are accepting the teachings of Jesus at their face value, with no mental reservations. They have laid their case before the churches of this city. They have signified their willingness to test out the declaration of the Ohio Valley Trades and Labor Assembly that the teachings of Jesus can be applied to modern industrial problems. They have invited ministers of all denominations to address their meetings; they have attended services in churches; they have proved that they are not 'rough-necks,' or irresponsible disturbers of the peace; proved that they are merely American workmen, trying to be husbands, and citizens, and fathers of the children who are to be the citizens of the next generation.

"The little-minded may say they are doing this for effect, for an ulterior motive; the ministers who have addressed them, who have met with them and studied them, will not say that. But how about this: One of their members died, leaving a widow sick in bed, with a week-old baby that afterward died, and two other helpless young children; it requires no imagination to picture the condition of this little family left suddenly without the protection of the bread-winner who earned less than \$24 per week, when he lived and worked. Three million dollars' worth of churches in Wheeling did not know about it, though, nor did \$350,000-per-year worth of church-workers; the golden sun that streamed through the stained glass of the churches did not reach around the alley corners into that bare sick-room. But the teamsters knew about it, they appointed themselves their brothers' keepers, they created a benefit fund by immediate and unanimous action, and they assessed themselves \$1 each, and took the cash to the widow!

"The teamsters have issued a challenge to every church, to every minister, and to every member of a church in Wheeling; they can answer that challenge only by practising what they preach, by doing what the Master they follow told them to do."

CHAOS IN PEACE-MAKING.

IF two-thirds of both Houses of Congress vote in favor of a resolution declaring that the war has ended, the war will be ended. There is no merit in the contention that the Chief Executive alone can bring peace. It is true that the founders of the Government did not contemplate a situation where the President would constitute himself the sole keeper of the gates of the temple of Janus. It was assumed that when a war was actually concluded he would recognize the fact by negotiating a treaty so declaring, and it was not assumed that he would refuse to negotiate such a treaty unless he were permitted to append to it an extra-legal agreement to change the form of government.

But there is nothing in the Constitution to warrant the belief that the legislative instrumentality is without authority in matters of peace. It can pass any statute over the President's veto, even a statute declaring that the nation is no longer at war with Germany. It can terminate a war by refusing to vote supplies for its prosecution. It is the war-making and therefore the peace-making branch of the Government, with the President the agency through which its mandates shall be carried out. Even if there were a constitutional inhibition, none could question the authority of Congress, by a two-thirds vote, to deprive the executive office of its extraordinary war powers.

The whole question, however, is academic, because more than a third of either the one House or both can be depended on to vote as the President desires. He has merely to issue his orders, and no peace legislation can be passed over his veto. Events have proved conclusively that this is true. The situation becomes, therefore, a play of politics. It is unfortunate that this is true, but it is true. Time was when politics was dropped at the seashore, but that was in older days, before Wilson lines were drawn on the map of Europe and the finger of Uncle Sam was dipped into every troublesome broth European intrigue brewed. Against a foreign foe the nation would stand as one man tomorrow. It knows how to wage war unitedly, but not so can it make peace.

The President boasted that he was going to Paris to tie a Gordian knot. He did it, and at what a cost to himself and

his country only time can tell. So vast is the power of the Presidential office. But even more vast is the power of the American people, and from the verdict they will render in November there will be no appeal. Then, if not before then, there will be peace.

A BALTIMORE BROKER WHO DOES NOT WANT THE LEADING MEN OF AMERICA AS CLIENTS.

[Baltimore News.]

PROHIBITIONISTS BARRED.

Winchester Banking Firm Doesn't Want Their Orders.

Marshall Winchester & Co., bankers, came out in an advertisement today in which they solicit orders for stocks and bonds, "except from prohibitionists."

Mr. Winchester was asked if he would explain, qualify or otherwise elaborate his simple statement.

"Now that is just like The News, to ask me a fool question like that. It means exactly what it says."

Mr. Winchester has been active in the fight against prohibition, but it is the first time he has taken the stand that he will not solicit the business of prohibitionists.

The advertisement to which the above refers is as follows:

[From Baltimore Sun.]

Buy Stocks and Bonds

We solicit orders, except from Prohibitionists.
CAMBRIDGE APARTMENTS
1st Mortgage \$5, due 1925.
Price 100 and interest.
Guaranteed by the
Mortgage Guarantee Co.

Marshall Winchester & Co.

Bankers and Brokers.
Established 1893.
Fayette and St. Paul Sts.

The MANUFACTURERS RECORD contributes the foregoing space without cost to Marshall Winchester & Co. in order that no man who believes in suppressing the accursed liquor traffic should by mistake make any purchase from a banking-house which thus blatantly announces that it wants no business from prohibitionists, even though, as every intelligent man knows, the greatest moral forces of the nation are unequivocally in favor of prohibition. Marshall Winchester & Co., if they follow their advertisement, would refuse to receive business from Judge Gary of the Steel Corporation, from Thomas A. Edison or F. A. Vanderbilt and tens of thousands of the other great business leaders of America who are ardent advocates of nation-wide prohibition of the manufacture, importation or sale of alcoholic beverages.

Will Investigate Reasons for Depreciation of Liberty Bond Prices.

Washington, D. C., April 6.—[Special.]—Representative Magee of New York has introduced a resolution demanding an investigation of the causes for depreciation in the market value of Liberty bonds. The investigation would be made by a special committee of seven members. It is understood that the object of the inquiry will be to discover what influence recent policies of the Federal Reserve Board have had in depressing bond values, and whether or not these policies are in effect a repudiation of definite promises made by the Government when the bond issues were floated.

THE PUBLIC MUST HAVE A VOICE IN FIXING RAILROAD WAGES.

THE action of the Railroad Executives' Conference Committee in breaking off negotiations with the Railroad Employees' Conference Committee comes as a recognition of the essential right of the public to be represented in any proceeding which is likely to impose a tax on the whole people amounting in the aggregate to more than three times what the annual cost of government was a few years ago.

The case was stated with clarity by Mr. E. T. Whiter in his letter breaking off the negotiations. He said:

"A recess was then taken, during which the railroad representations considered your requests and compiled figures to estimate the increased yearly costs. A very conservative estimate shows a total of more than \$1,000,000,000.

"This estimate is based only on the requested changes in the rates of pay, and no attempt has been made to estimate the cost of changes in rules which would further materially increase the total. Consideration of your requests and the bases upon which they are predicated has convinced our conferees that there is no intermediate ground which could be reached that in itself would not represent an aggregate sum so great as to be beyond the possibility of our reaching a settlement.

"To study all angles of the subject exhaustively would require a long time, and, notwithstanding any points which might develop in your favor, the railroads could not assume the responsibility of adding such a burden to the costs of transportation, excepting with the full knowledge and consent of the public through its representatives, and we must, therefore, decline to grant your requests and let the matter be disposed of as provided in the Transportation Act."

The effect is to send the whole wage controversy to the Labor Board, where the public is represented.

From the beginning the railroad brotherhoods have been persistently averse to participation by the public in a determination of wages. This is the more inexplicable in that the brotherhoods, in endorsing public ownership, have repeatedly emphasized the superior interest of the people themselves in the conduct of the railroad properties. Long ago it became apparent that the nation could no longer permit the employers and the employees to fix wages, when the invariable result was to pass the cost on to the public. The power to fix wages in such a case, since it carries with it sure increases in rates, is scarcely different from the power to tax. Taxation without representation is tyranny.

If railroad wages in fact are too low, and if the enormous sum of a billion dollars a year must be added to the payrolls as a mere matter of economic justice, the people will be the better satisfied if their own representatives so decide after a study of the statistics and information presented. If, on the other hand, such enormous increases were permitted without public representation, the people would tolerate the situation only under protest.

The public interest is paramount and the time will come when the brotherhoods will themselves invoke that principle in their own behalf.

NEW CUES IN THE COAL WAGE DRAMA.

THE Department of Justice, which has been on a rampage lately, announces that it will begin action against any bituminous coal operators who unduly raise prices as a result of the wage agreement. Why cannot the Government be frank? The whole bituminous coal situation was a farce from the beginning. The Government went in like a lion and came out like a lamb. It was very well understood that the miners had been given substantial guarantees that the Coal Commission would meet their wage demands. Men who were within the restraint of the law were parleyed and compromised with, and the ringleader of them was congratulated by the President for his patriotism. But the Coal Commission served its purpose of overruling the former Fuel Adminis-

trator, Dr. Garfield, and on the same presentation of facts awarded an increase virtually double that which Dr. Garfield had decided would be fair and just.

When the decision was announced there was not a man versed in coal politics who did not await with interest the new policy of the Administration. All recognized that an increase in coal prices would have to follow. Would the Government, having forced the advance, follow the thing to its natural conclusion and fix the new price; or would it "pass the buck" by surrendering control and putting on the operators the onus of increases? It followed the latter course, as the operators expected. And then, before the operators even had time to decide what the new prices should be, the Attorney-General began hurling his thunderbolts at them. That may be fair play, but, if so, the textbooks on ethics will have to be rewritten.

If there is any operator who does try to take advantage of the wage award to further enhance his own profits, we hope the law will be invoked against him and that he will learn to lament his crime inside the walls of a penitentiary. But common decency would seem to require that when the Government itself has put the operators in a trap, it wait a little while before accusing them of trespass.

THE THREE ESSENTIAL "R'S."

Columbus Manufacturing Co.
Columbus, Ga., March 27, 1920.

Editor Manufacturers Record:

At this glorious Easter time may I be permitted to say that upon—

Liquor,
Labor and the
League

you have been

Right,
Right,
Right.

FREDK. B. GORDON, President.

We would be less than human if we did not confess that letters such as the foregoing are exceedingly gratifying. The MANUFACTURERS RECORD has for years been engaged in what it believes to be a great campaign for the betterment of mankind and for this country. It has fought the accursed liquor traffic; it has sought to show the evils of radical labor agitation, and at the same time point the way to harmony between employers and employees, and from the day the League of Nations was first announced in this country it has never wavered in the belief that the greatest work it could possibly do would be to antagonize that League. In that fight it has put forth its best energy and it never expects to haul down the flag, and so long as the liquor interests are fighting to damn the world with their accursed traffic we expect to keep on fighting for sobriety and morality, and for the women and children upon whom the liquor business has brought infinite sorrow, and until the time comes when men everywhere will treat other men as they would that men should treat them and until peace and harmony between labor and capital prevail, and against unwise radical labor agitation and at the same time against unwise radical action on the part of employers whenever the employers make the blunder of unjustly exploiting labor.

Employers and employees alike have rights, and the MANUFACTURERS RECORD hopes to see these rights recognized by both sides, and so long as the League of Nations is before the world in its present form we expect to antagonize it to the utmost extent of our power. In this we are glad to know that the trend of thought which early in the day was so pronounced against the position of the MANUFACTURERS RECORD is now becoming overwhelmingly in favor of it.

Has Our Country Outgrown the Limits of the Federal Reserve System?

The National City Bank of New York.

New York, March 23.

Editor Manufacturers Record:

Replying to your recent inquiry as to general banking policy, I beg to say that I do not interpret the recent action and advice of the Federal Reserve Board as threatening drastic deflation, but rather as intended to hold inflation in check. A degree of inflation during the war was accepted as unavoidable, and perhaps it was also impossible to avoid an additional amount in the first year following the war, but an increase of the loans of the Federal Reserve banks from \$2,120,133,000 to \$2,805,818,000 during the year 1919 certainly called for serious attention, particularly as the Reserve System is approaching the limits of expansion contemplated in the law and being depleted by gold exports. It is to be considered that any amount of credit may be absorbed by rising prices, and that the free use of credit will facilitate and promote higher prices. The price level is already abnormally high, and, while it is important that the essential industries of the country shall be kept going to capacity, it is also important that the entire business community shall be governed by a spirit of caution. The loans made during the war for the purpose of carrying Government bonds should be liquidated as rapidly as possible in order to set free the resources of the banks for the support of necessary business.

J. A. STILLMAN, President.

The Race Question and the League of Nations.

Editor Manufacturers Record:

Since the League of Nations scheme cannot be kept out of the Presidential election this year, I see no reason why we should not discuss the idea from every standpoint, especially the non-partisan. Why should a Democrat be for the league? Why should a Republican be against it? Not long ago in Alabama I asked a man what per cent of the people there were in favor of the league. He said "about 25 per cent," and said, further, that he did not believe 5 per cent of the people would advocate it if President Wilson were to declare himself against it.

Neither do the people of Georgia want the league. I believe about 25 per cent of the people in this State are in favor of it, and would like to say that if Mr. Wilson and his followers have not stirred any more enthusiasm in other parts of the country than they have in the parts of the South I have been in, they are a flock of "gone goslings," so far as the league is concerned. But it seems that the supporters of the league got their most solid support from the South.

Now, among all the reasons yet offered as to why the league should be rejected, I offer one more to show why the people of the Southern States should vote solidly against such a scheme. That is the race question, which has been a tough problem to the people of the South for many years. Most of the people of the South who stand out for the league are the most bitter enemies to any law, either Federal or State, that can in any way be construed to bring about race equality in the South, and the Senators who voted for the league did so knowing that we were going into it on an equal footing with a negro republic of Africa. Now, you will remember that not long ago the Japanese Government contemplated bringing a suit in the international council to secure Japanese rights to citizenship in all countries. Of course, this was aimed at the United States, but when they saw they had brought up the idea too soon they postponed the same, awaiting the action of the United States Senate.

Now, if the Japanese Government can by such a course secure the right to come to our country and have equal rights with us when they get here, then what is to hinder that negro republic of South Africa from doing the same? And a little study of the United States Constitution will inform you that that document and all laws made in accordance with it and all treaties properly ratified are the supreme laws of the land, notwithstanding the laws of any State to the contrary. If the Senate should ratify that treaty as it was made, without reservation, and if such a course should be taken by the negro republic, as no doubt it

would be, and if we should lose our case in the international court, as I believe we would, then what could we do with our race question here? How could we have separate schools for the children of the two races? How could we enforce our laws relative to hotels, street cars, railroad cars, etc.? We would have to do it in defiance of our Federal laws, which we could not do; neither would we attempt to do it.

I hope all Southern people will study this feature of the league proposition and advise our Senators how they should behave in the Senate after March 4 of next year. And remember that when the treaty is ratified, it becomes the law of the land. How can a Southern man who believes, as most of us do, that the best thing that can be done in the South is to keep the two races separate, as we now do, vote to harness ourselves up with the different races of the world on an equal basis with all of them?

VICTOR WADE.

Atlanta, Ga.

Regards Herbert Hoover as Greatest Man Alive, League of Nations Greatest Document Since "Time of Jesus" and Lodge as Guilty as Kaiser, With None of Which We Agree.

A. B. Farquhar Co., Limited.

York, Pa., March 24.

Editor Manufacturers Record:

In reply to your personal letter would say we have been subscribers to the MANUFACTURER RECORD, or at any rate it has come to us, for many years. We find it one of our most valuable and interesting trade magazines. The writer did not agree with you on the question of the League of Nations. He regarded the covenant just as it came from Versailles as the greatest work for the good of mankind, at least since the time of Jesus. It should have been promptly and enthusiastically and immediately passed. There were plenty of provisions in the covenant to protect this country, provisions also for amendment, or for retirement from it altogether if it did not prove what was expected of it. The world would unquestionably be at peace today and prosperous had the United States joined with the other nations in this league, and I look upon Henry Cabot Lodge as equally guilty with the Kaiser, ranking as one of the two great enemies of mankind.

Yes, the economic questions of the day are exceedingly interesting, and their study is very important. The increase of product to restore the waste of war is essential. Since all we eat or wear is the product of labor, as labor goes up the cost of living must advance proportionately. There is danger of this stilted process becoming topheavy and falling down with a crash, and it is well for all men, especially business men, to be prepared for it.

A. B. FARQUHAR.

P. S.—We cannot help the past, but the present is in our keeping. We can atone for much of the evil done and insure the future by electing our greatest citizen, the greatest man now living—Herbert Hoover—as President—one of the highest character, greatest international knowledge, and our greatest executive. The building up of the waste places, re-establishing the work, is and must be largely the work of an executive, and I know of no one so well fitted for it as Herbert Hoover.

New Uses for Old Buildings.

Fort Worth, Tex., March 31—[Special.]—Due to the activities of the local Chamber of Commerce a well-known Eastern paint manufacturing company has taken over a former brewery property, which has been altered to suit the purpose of the new tenants. Sufficient room remained in the altered building to house a company manufacturing gas mantles.

Office space in Fort Worth is at a tremendous premium, many makeshift arrangements being made necessary until the situation is relieved.

That the city is doing big business is shown by the bank clearings, which for the week ending March 27 were very close to \$20,000,000, an increase of about 50 per cent over the corresponding week of a year ago. A bank which began business seven months ago with \$2,000,000 on deposit had \$6,000,000 at the end of the first six months and \$7,000,000 at the end of the seventh month.

The South as a Field for Railroad Development Work*

By RICHARD H. EDMONDS.

The men who are engaged in railroad development work in the South and Southwest have a right to regard their business as a holy mission and to enter upon it with the spirit of the crusader.

We could not have been a factor in winning the European War and saving the world from barbarism if it had not been for the utilization of the material resources of the South.

I do not lay any particular stress in the present discussion of the subject upon the heroism of Southern men in the contest, because men from all sections did heroic work, but there were some things which the South did which no other section could do.

Without the materials furnished by the South we could not have engaged in the war in any successful way, for we would have had no sulphur out of which to make sulphuric acid, which enters so largely into all of the chemical and explosive work of the world. The South furnishes 99 per cent of the entire sulphur production of this country, and at the present time is producing about 75 to 80 per cent, and possibly even more, of the entire output of sulphur for the world. Without the South's sulphur we would have been helpless. This is one item in the South's contribution to the war.

Another contribution which is more generally understood is the cotton crop, which has enriched the world to an infinitely greater extent than it has enriched the South. For 50 years the South has been bearing the world's cotton burden, clothing the world and furnishing a vast amount of fats for the feeding of the world, and doing it with far greater profit to other sections than to itself. Without this cotton we could not have developed our explosive work for war, we could not have provided the clothing for our soldiers, nor the tents for the battlefields nor the tires nor the tops for the automobiles and the motor trucks.

But sulphur and cotton, two essential products in the South's contribution to the war, are only typical of many things which enter into the very foundation of the material life of this nation, and yet our country seems to have scarcely begun to comprehend the vastness of these resources and their influence upon the nation's life and upon the world. It is not a far stretch of imagination to say that upon the South's material resources depend the life of this nation and the salvation of the world. In the momentous years which are ahead of us no man can possibly foresee as yet how to face all of the problems of the future, but we know that these problems can be aided in solution by the fullest development of all of the vast material resources which the God of nature has so abundantly provided for the benefit of mankind.

This section has been more abundantly blessed with material resources than any other equal area in the world. It is a trite saying that it has a greater combination of natural resources than any other region on earth. Its mineral wealth is beyond our power to comprehend. It has a coast line of three-fifths of the entire coast line of Continental United States. It has mighty rivers and rivulets, which, draining the mountain regions, flow to the Atlantic and to the Gulf, offering vast potentialities for hydro-electric power only partly used as yet.

It has fully demonstrated that it can become the dominant section of America in the production of foodstuffs. Last year there was a shortage of 236,000,000 bushels of corn, wheat and oats in other parts of the United States outside of the South as compared with the preceding year, while in the South there was a gain of 335,500,000 bushels in these grains. Had there been no increase in the grain production of the South last year the shortage in the rest of the country would have caused very much higher prices than those now prevailing.

The future of this country, and that means the future of the world, because as America goes so goes the world, depends upon the South. The West has almost reached the limit of its grain and cattle production, except under extraordinary circumstances which may not prevail for many years. The South alone can meet and solve the problem of increased food supply, both as to grains and livestock. Cotton, even at the prices now prevailing, is not

nearly so profitable to the South as would be a diversification of Southern agriculture out of which would come an enrichment of the soil, a larger production of meats and a widening of the horizon of Southern farmers who in diversified agriculture would find a development of diversified thought and better living conditions.

There is room in the South for almost unlimited expansion in the increase of foodstuffs. The man who helps to bring about the more intensive cultivation of a single acre of land, whether by the farmer now in the South or by a farmer brought from other sections, is to that extent helping to benefit the entire world by adding to the world's food supply. For 15 years there has been a decreasing food production in the United States in proportion to population. We would have had high prices for farm products if there had been no war. The war has tremendously intensified the situation which was in evidence 10 or 15 years ago to anyone who was willing to study and face the actual facts.

The world needs increased coal production. In this country we can scarcely comprehend what it means to freeze almost unto death, as many of the people of Europe have to do every winter for lack of fuel. Here we have coal in almost limitless quantity available for utilization. The South has twice as much coal area as all of Europe, including Russia. It has five times as much as all of Europe, excluding Russia. It has three-fourths of the coking coal area of the United States. With a larger development of its coal and with the cost of ocean transportation reduced to normal figures, the South could help to meet the world's cry for fuel in order to save millions of people from freezing and in order to furnish the fuel which would run the factories of non-producing coal countries.

The iron ores of the South are in quantity almost equal approximately to its vast coal resources, but iron and coal, the foundation of the world's great material development, are in the South supplemented by oil, for this section produces largely more than half of the oil output of this country. In addition to coal and to ore and oil, the South has natural gas in vast quantities. It has almost a monopoly of the world's developed phosphate rock. It has granites and marbles and clays without limit. It furnishes half of the lumber used in the whole country. It provides the bauxite for practically the entire aluminum industry of America, and the variety and extent of its mineral resources and its potentialities for electrochemical industries stagger the mind of every expert who studies these questions. They can find no words in which to express in sober language their boundless enthusiasm when they begin to understand the wealth of the South's resources and its marvelous combination of advantages.

The South is indeed the greatest undeveloped asset of America. Every dollar of wealth added to the South is adding to the wealth of the nation. Every farm improved, every mine opened, every mill built is but one more addition to the nation's wealth and to the rounding out of the highest development of the country's life from the business as well as from the national standpoint.

In attempting to show to the people of the North and West, as well as to the people of the South themselves, the limitless extent of the resources of this section every railroad development agent should fully understand and be able intelligently to present the conditions of the South prior to the Civil War, the infinite losses due to that war and to the reconstruction in the years following, for otherwise no intelligent presentation can be made of the South.

When outsiders undertake to contrast the vast developed wealth of the North and West with the more limited wealth of the South many are inclined to think of the difference as being due to a lack of energy in the South or to a lack of resources. When anyone suggests that the South lacks energy he immediately reflects upon the energy of the North and West, for if the South lacked energy and power to endure great strain and do tremendous work, how shall we explain the fact that, cut off from the entire world, with every port blockaded and with only about 600,000 soldiers, it was for four years enabled to hold at bay the tremendous resources and the armies of the Union, with from 2,500,000 to 3,000,000 soldiers. To say that the South lacked energy would be to say that the North and West to a still greater extent lacked energy, in that it

*Copy of letter addressed to the convention of the industrial and agricultural agents of Southern and Southwestern railroads held at Birmingham April 6 in response to invitation to make an address on that occasion.

took the Union four years to conquer the South, though it had more than four times as many soldiers and its developed resources were in still greater proportion. From Germany we hear an unceasing cry of poverty and distress, and the cringing, cowardly nature of the German was never better illustrated than in the spirit which today seeks to escape its just penalty by crying poverty. Germany did not have to endure half of the strain of war which the South suffered. The Allies and America never brought against Germany so preponderating a power of men and money as the Union brought against the South. In each case the struggle lasted for about four years. The South was overrun. It was the battlefield. It suffered all the penalties of being the battlefield. On the other hand, no section of Germany had been invaded prior to the armistice, not a farm had been molested nor a factory injured by the work of war; its banking business continued, its industries went on, and its farms were worked. In the South, on the contrary, farms and factories alike were overrun and to a large extent destroyed. The entire livestock resources of the South were absorbed for the maintenance of the soldiers, and still the Southern army, barefoot and hungry, marched and fought as probably no other people in the world ever did.

When the armistice ended, Germany had its banks and its business institutions, its farms and its factories, its Government and everything which a defeated nation could possibly have had on which to rebuild its fortunes. When the Civil War ended with the defeat of the South, this section was practically without government. It had to re-establish law and order. For 10 years it had to struggle to save Anglo-Saxon civilization, for this fair land was in danger of becoming a San Domingo or a Haiti. The 10 years of reconstruction were an infinitely greater loss to the South than the war itself. During that period political corruption ran wild, with negroes dominating most of the Legislatures of the South, headed by the most unscrupulous set of Bolsheviks which ever cursed a country. As Trotsky and his gang went to Russia to loot and rule that country, so men of the same Bolshevistic spirit rushed to the South to ride into power on the votes of ignorant negroes in order to loot the South. They did both. They planted the seeds of hatred on the part of the negroes against the white people of the South, and out of that diabolical work have come many of the race troubles of the present hour. For 10 years the Bolsheviks of that stripe held sway over a very large portion of the South. Life and property alike were unsafe. Under these conditions there began a tremendous movement away from the South of people who sought the opportunity of making a living elsewhere freed from the fearful curse of Bolshevistic domination of carpetbaggers and the lack of employment. That movement did not stop until nearly 5,000,000 Southern-born whites had emigrated from the South between 1865 and 1900. These people moved out of that portion of the South from Virginia to Louisiana. About 3,500,000 went entirely beyond the borders of the South and about 1,500,000 into Texas. This drain of 5,000,000 whites was the greatest drain of population known in modern times on any country. It meant an infinitely greater loss viewed from the money point alone than the losses of the war itself. It meant a drain on the vitality of this section, on its educational power, on its initiative and constructive power. Moreover, it must be remembered that one of the terms of admission of the South back into the Union was that not a dollar of indebtedness incurred for carrying on the war should ever be repaid. Southern bonds and Southern money were thus by a stroke of the pen wiped out of existence. Germany has had no such situation to face. The South met the situation with heroic vigor. Germany is meeting its situation like a cringing coward and whipped bully.

In studying the development of the South during the last 50 years and the opportunity for the future, these facts will be found the strongest possible argument to show the inherent strength of the South's position.

Between 1850 and 1860 the wealth of the South increased by more than \$1,000,000,000 in excess of the combined increase of the New England and Middle States, and at that time the aggregate wealth of the South greatly exceeded the aggregate wealth of the New England and Middle States, but when the war ended their wealth exceeded that of the South by over \$10,000,000,000.

Starting in 1865 with overwhelming poverty, poverty far greater than any Europe knows today, with a disorganized labor system, which for 10 years was under what I have called Bolshevistic con-

trol, the South has re-established itself and last year produced more than \$10,000,000,000 of crop and livestock values, or as much as the entire United States produced as late as 1915.

Forty-four per cent of the entire agricultural output of the United States in 1919 was the part contributed by the South to the nation's agricultural production. And yet the South is only now beginning to get on its feet financially and to develop its industrial and agricultural activities somewhat commensurate with its natural advantages. What has been achieved is only the merest hint of the possibilities ahead of this section. With the world hungry for food, hungry for iron and coal and cotton and lumber and sulphur and phosphate rock and a thousand other things which the South has in abundance, I repeat, with added emphasis, the statement that the railroad men who are engaged in helping on the development of the utilization of these resources are missionaries in a great and holy cause and upon their work may largely depend the future of the country and of civilization.

How Florida Looks to a Northerner.

Miami, Fla., March 30.

Editor Manufacturers Record:

Some 325 years ago Florida was settled. It is the second largest State east of the Mississippi, Georgia being a little larger. We think of it as a long State, but it is considerably farther from east to west extremity than north and south.

Thousands of acres of second-growth pine timber is being destroyed by partial girdling just to get the sap for turpentine and resin. In fact, nearly all the way from Richmond down one sees this wanton waste, and it seems to me that any country that will permit such waste of its forests ought to be ashamed, and that very drastic laws should be enacted to stop it.

In every part of the State are seen very rich crops, such as oranges, grapefruit, pineapples, etc., and vegetables are grown in many places, but it seems that a very large part of the land is uncultivated at all. One sees land producing \$500 worth of crops per acre, and then miles of similar land not cultivated at all. This land will not produce crops without fertilizer: neither will any land for any length of time produce crops without fertilizer. It can't be done, whether it be California, New York or Ohio: but Florida has miles of phosphate rock: in fact, probably more than any other State. Cargoes of it are being shipped to Europe, and thousands of tons are being used in every Northern State, and the amount is increasing every year, and will increase more and more. Then why not use it more here? Potash can be delivered here about as cheaply as in Baltimore, Philadelphia or New York, and phosphate and potash are the principals of commercial fertilizer. Much of the land here needs draining. So did the lands of western Ohio and Michigan and Indiana.

There is danger of frosts here. So there is danger of frosts in California—more so, I think, than here. The demand for early vegetables is getting larger every year, and as the cities get larger and richer the demand will increase. I saw land in the Everglades which was under water a year ago produce the finest crops of tomatoes, peppers, lettuce and other kinds of vegetables, also strawberries. These large canals are certainly doing wonders, and there are many of them.

Japan cane for cattle food and sugar-cane for syrup will soon be grown here by the mile; in fact, is now being grown here, and all within and near large markets either by water or rail transportation.

Of course, the best crop now seems to be tourists from the North, and while this is no small matter, and while it will continue to increase each year, yet it should be of small comparison with other matters pertaining to the welfare of the State. I notice that a large part of the food used, at the hotels especially, is canned goods, and meats are nearly all procured from the North instead of being grown and canned right here where they should be.

I heard a very fine lecture here a few nights ago on the wonderful resources of the South. A large part of the lecture was taken from the MANUFACTURERS RECORD, but the trouble was that the speaker did not even mention the MANUFACTURERS RECORD at all. But there are all kinds of people in the world, and so it goes.

C. O. BARTLETT.

A Tax on Sales vs. The Destructive Tax System

By JULES BACHE, New York.

The present methods of taxation threaten to drain the resources on which the entire business structure of the United States depends, and while we hear many predictions that taxation will decrease, we must face the fact that for many years to come the requirements of our debts, including the amounts loaned to our Allies, as well as the high rates at which Government expenditures have been fixed, will call for a taxation of from four to five billion dollars per year.

To continue to raise this amount by excess profits taxes and heavy income taxes means the complete elimination, in our opinion, of the resources of the investors upon whom this country and its enterprises have been dependent during all these years to furnish such new capital as commercial and financial developments required. Before the war there was an army of about 400,000 investors, small and large, who could be counted upon to absorb a varying amount of securities, running into the hundreds of millions. This army has now completely disappeared and many of these same investors, owing to the increased cost of living, with the heavy income taxes, are practically consuming a percentage of their capital to meet living expenses.

The fact that enterprise is handicapped by a heavy profits tax makes for ultra-conservatism on the part of the speculative investor, who must pay out a large percentage of his profits, if any are made, but must stand 100 per cent of his loss if his judgment is at fault.

The wealth of this country has been built up by savings out of profits in business. There are no such savings today. One of the pessimistic influences in the present situation is that, whereas in former periods of booms in business the merchant who made a large profit, while spending liberally, was enabled to put generous sums back into his business to provide for the reaction that was certain to come, we now have a situation where, due to the last three years of business boom, profits have been large; yet merchants have had to pay out in either income taxes or excess profits taxes practically all that they have earned over their living expenses, and when the losses due to the readjustment of values are registered, many will have suffered material reductions in their resources, which would ordinarily be relied upon to meet these losses.

All this must change, or business will reach an impasse.

An Economic Tax Should Be Substituted.

There is only one way to escape this, and that is through a tax on sales, in which every citizen of the United States, as well as any foreigner who may live within our shores, will pay equally toward the expenses of the Government and have his stake in the country.

A small tax, say 1 per cent on sales, while it would produce in the aggregate an amount large enough to make it unnecessary to keep the excess profits tax in force, might be large enough even to reduce the surtax on income, and would bear so lightly upon the individual that its existence would be scarcely perceptible.

It would be, in effect, a flat percentage of 1 per cent against volume of business, to be paid monthly by every corporation, partnership, association or individual in business.

In the case of banks, brokers, jobbers or commission men, the percentage should apply on "gross income" before payment of operating expenses, rather than against gross volume of business handled.

The turnover in the United States for the year 1919 is estimated by a competent financial authority at between \$1,400,000,000,000 and \$1,500,000,000,000. These figures have been arrived at by using a method employed by Prof. Irving Fisher. Mr. Fisher estimates the circulation of money and of checks, adds the two, and obtains a figure for the value of goods bought. His 1918 figures showed a total of \$1,269,000,000,000. The same method shows an approximation of \$1,484,000,000,000 for 1919.

From this amount must be deducted the turnover on the various exchanges—grain, cotton, stock, the sale of securities, municipal, corporation and others—but we do not think that these amount altogether to more than \$500,000,000,000. This would leave

\$1,000,000,000,000 to be taxed, but if we reduce this by half, if it should develop that duplication in the figures amount to any such percentage, we would still raise \$5,000,000,000 by this tax.

That is, a tax of 1 per cent on sales of \$500,000,000,000 would produce revenue of \$5,000,000,000 a year.

Advantages of a Tax on Sales.

The analyses appearing on the following pages show the tax of 1 per cent on sales worked out for three of the important products of the country, and while this shows that the tax is duplicated several times during the progress of these commodities through business channels, the tax falls only once upon the same class of business men.

In the case of the loaf of bread, the ultimate purchasers do not have to pay more for their loaf, and the tax would be absorbed by the seller in the various movements which the wheat makes until it reaches the ultimate consumer. On beef the maximum would be one cent per pound, and the same rates would apply to hog products.

The advantages of this tax would be that it would be equally paid by everybody in the country, and might lead, perhaps, to thrift, since those who wish to avoid paying taxes would only have to decrease their expenditures.

If any such amount can be raised as would appear probable, predicated on the figures submitted, all income taxes on incomes of \$5000 or less would become unnecessary, and a nominal income tax on all other incomes would be sufficient. Today an income of \$5000 pays between \$120 and \$160. Under the new tax, if it is expended in toto for the purchase of commodities, the income of \$5000 would pay a tax of \$50, assuming that every article purchased has had the tax added and the consumer has to pay it. But on many articles the tax is so small that it is absorbed or paid by the seller out of his normal profits and not added to the purchase price.

This tax can only be consistently levied and collected if paid by the seller, and should be evidenced in the working out of the tax by stamps on receipts, where books are not kept, or by charges against turnover as shown by merchants' books, less any allowance for stamps given on receipts. It would be the simplest tax that could be collected, and there need never be any dispute as to the amounts of individual taxes, as now arise in a multitude of cases under the present tax laws. It will require a very much smaller staff to collect, and practically no expert service. It will materially reduce the expenses of the Government in collecting taxes, and the yield can be very closely figured, and cannot materially shrink or increase by temporary developments in values or the volume of trade, since the turnover in the volume of the country's business rarely fluctuates more than 10 per cent in a year.

Realizing that this tax is such a radical departure from any other system of taxation now in use in this country, a campaign of education becomes an important essential. We are taking the liberty of putting this before you with a view of enlisting your interest in the movement and your aid in spreading the doctrine in your locality, bringing all the influence possible to bear on legislative bodies in Washington, so that a full consideration may be given it.

Application of This Tax.

On Bread.—In estimating the effect on the price of a loaf of bread the tax would be levied first when the wheat leaves the producer; second, when it leaves the miller; and third, when it leaves the retail grocer or the baker. Prices and taxes would be as follows:

When It Leaves the Farm.		Price.	Tax.
One bushel of wheat would be sold for, say.....		\$2.00	\$0.02
When It Leaves the Miller.			
4½ bushels of wheat to the barrel, with flour averaging 12 per barrel, would make one bushel of wheat in flour, worth		2.67	.0367

When It Leaves the Baker.

A barrel of flour makes from 260 to 270 loaves of bread. One bushel of wheat is two-ninths of a barrel of flour. This would make 60 loaves to a bushel of wheat. Figuring these 60 loaves at an average of 8c. to 9c. per loaf, price would be..... 5.10 .0510

This would make the total tax on all sales of a bushel of wheat, from wheat to flour to bread..... \$0.0977

This tax thus far—approximately 10c.—is the total price to be added to the 60 loaves of bread on account of the 1 per cent tax on sales progressively from the farm to the consumer.

This total tax, if passed along, is so small, amounting to less than one-sixth of a cent per loaf, that it could not be added to the price per loaf to the consumer. It would probably be passed on by the miller and be paid by the baker; but would be such an infinitesimal reduction from his profits that he would be almost totally unaffected.

These calculations are based on only three sales, from farmer to consumer; but if one or two more sales of the wheat take place it would still leave the tax at a small fraction of a cent to the loaf.

Further than this, it is stated that bakers do not bake half the bread used. Many domestic users buy flour from grocers and make their own bread. This further reduces the individual tax.

Calculations of the Tax on Beef.

In the same way the tax result on beef may be estimated as follows:

Result on steer killed July 17, 1919, Lot 301:

Cost of Live Animal and Expense in Killing and Disposing of Resulting Products.

Live weight 1202 pounds at \$16.34 per cwt..... \$196.41
Expense and labor, buying, killing, driving, yarding, feeding, refrigeration, etc..... 8.85
Cost of selling (branch house expense) 85c. per 100 pounds..... 6.10
Freight to branch house 710 pounds at 69 cents..... 4.90

Total cost..... \$216.26

Amounts Received for Products Sold.

Fats—85.3 pounds at \$18.81 per 100 pounds..... \$16.14
Hide—78 pounds at \$32.71 per 100 pounds..... 25.51
Offal—Edible and inedible, at 41c. per cwt. Live weight..... 4.93
Dressed Beef—720 pounds, less shrink 10 pounds—net 710 at \$23.99 cwt..... 170.33

Total selling price..... \$216.91

How the Tax Would Affect the Consumer.

	Price.	Tax.
If we analyze these figures we find that the cost to the packer of one steer would be.....	\$196.41	
The tax of 1 per cent, to be paid by the farmer or the seller, would accordingly be.....		\$1.96
Following up the 720 pounds (net 710 pounds) of dressed beef, the selling price of this would be.....	170.33	
On which the tax paid by the packer would be.....		1.70
The total tax which might be added to the beef, first by the farmer and then by the packer, would thus be, when the beef reached the retailing butcher.....		\$3.66

Dividing this tax up among the net 710 pounds of dressed beef, we find that the tax on each pound would be..... \$0.005+

If the butcher sold the beef at, say, an average, all cuts of 40c. per pound, his tax would be four-tenths of a cent per pound—or two-fifths of a cent..... .004

The total tax thus far, if added to the price to be paid by the consumer, would thus amount to..... \$0.009 which is a little less than one cent a pound on beef. This includes all taxes from the farm, to the packer, to the butcher and to the consumer.

Calculations of the Tax on Hog Products.

We have obtained, also from official sources, figures on the cost of hogs and hog products, and have estimated the tax which, under this plan, would be levied from the time the animal was sold by the farmer until the various products reached the consumer.

Result on Hog—October 17, 1919.

Live weight, 306 pounds at 14.3c..... \$43.76
Expense and labor, buying, yarding, driving, killing, feeding, refrigeration, etc..... 4.59

Total cost..... \$48.35

Value of Products Resulting from Hog.

Hams..... 14% of live weight, 42.84 lbs. @ 20½c	\$8.78
Bacon & fat backs 31% of live weight, 94.86 lbs. @ 21½c	20.16
Shoulders..... 12½% of live weight, 38.25 lbs. @ 22½c	8.61
Lard..... 8% of live weight, 24.48 lbs. @ 29c	7.10
Leaf lard..... 3% of live weight, 9.18 lbs. @ 29½c	2.71
Other products..... 4.02% of live weight,	1.44

72.52% \$48.80

72.52 is the per cent of marketable products to live weight.

How the Tax on Sales Would Affect the Consumer.

	Price.	Tax.
If we analyze these figures, we find the cost to the packer of one hog would be.....	\$43.76	
The tax of 1 per cent, to be paid by the farmer or the seller, would accordingly be.....		\$0.44

Following up the approximate 217 pounds of consumable products of one hog, the selling price of this would be..... 48.80
On which the tax paid by the packer in selling this would be..... .488

The total tax which might be added thus far, first by the farmer and then by the packer, would be, when the hog reached the retailing butcher..... \$0.928

Dividing this tax through the 217 pounds of consumable products, we find a tax on each pound of..... \$0.0043

The tax thus far on the 217 pounds of consumable products is, as we have seen, about 93c., or at the rate of less than one-half of 1c. on each pound. If the butcher sold the pork products at retail prices, he would receive about \$107, on which his tax would be about one-half of 1c. per pound, namely..... .0049

The total tax, if added to the price to be paid by the consumer, would in all amount per pound to..... \$0.0092

Another Ex-Governor Becomes Delta Landowner.

Memphis, Tenn., April 5—[Special.]—Allen Miller Fletcher, former Governor of Vermont, is another ex-Governor of a Northern State to become a big landowner in the rich bottom region of Mississippi. Mr. Fletcher has bought the big Lake Dick Plantation in Yazoo county. Former Governor George Sheldon of Nebraska is owner of extensive farming lands in the Mississippi delta in the vicinity of Wayside, Miss., in Washington county. Both the former Governors are enthusiastic over their investments, believing the delta region holds greater agricultural possibilities than any other portion of the United States. They will spend most of their time South, the Vermont man to live on his property during the winter.

Ex-Governor Fletcher is visiting at his properties now. His land is in corn and cotton, and he has hogs and cattle on the place. He is especially interested, however, in the fine timber on his plantation, which he expects to preserve.

To Mine West Virginia Iron Ore.

Plans are being formulated for the development of iron-ore deposits along Armor Creek, near Sissonsville, Kanawha county, West Virginia, where 3000 acres have been leased by West Virginia and Ohio capitalists. The properties are located near the Government nitro plant at Nitro, and a company will be organized to undertake the developments with G. K. Nesbitt as president and W. J. Priestly as secretary, both of Charleston. Edward Frazier of Hanging Rock, O., is also interested. Mr. Priestly is superintendent of construction at the United States naval ordnance plant, South Charleston, and, with Carlton P. Peyton of Charleston, is surveying for a standard-gauge railway to be equipped for transporting the ore.

West Virginia Aluminum Ware Manufacturing.

Aluminum ware will be added to the products of the Fletcher Brothers Enamel Co., Dunbar, W. Va., capitalization having been increased from \$150,000 to \$450,000 in order to provide the necessary funds for an additional plant. The new buildings will be of steel and concrete fireproof construction, contracts for the materials having been awarded.

New Canning Plant to Begin Operations Next Month.

New Iberia, La., April 2—[Special.]—The New Iberia Canning Co., a corporation organized to further develop the canning and truck-farming industry in this section, is constructing a plant at a cost of about \$50,000 and is planning to begin operations early in May. About 100 persons will be employed in the canning end of the industry, while the factory will consume an immense amount of the products of the farms in the surrounding country. The company will specialize in the canning of okra, blackberries, tomatoes, cane syrup and spinach. Spinach is an all-year crop in this vicinity.

Responsible Brick Manufacturer Wanted.

The city of Post, Tex., is interested in securing the services of a successful brick man to take over and operate the plant of the Post Brick & Tile Co., according to V. A. Robinson of that city. The plant is said to be one of the best in West Texas and to offer a good opportunity to a responsible party.

Government's Estimate of Cost of Growing Cotton Crop of 1918 the Work of Theorists

By W. W. MORRISON.

The Department of Agriculture has just issued a report on the cost of the cotton crop grown in 1918.

It cannot be said that the report is very illuminating. It is involved. It is generally inconclusive. It will be difficult for the public to understand. It can be easily misconstrued by those who are honest, and just as easily misused by those who are dishonest. What it reveals as to the relation of labor and other fundamentals to the cost of production, important as they are, is obscure and somewhat mystifying.

The report goes on to state that the "bulk line cost" was found to be 28 cents per pound. This term, "bulk line cost," seems to have been used as a kind of economic barometer to demark the range of prices, above which production is supposed to increase and below which production is supposed to decrease. On this basis it is stated that 66 per cent of the farmers made a profit. No explanation is given, however, of why, in spite of this fact and this theory, production has continued to decrease and labor has continued to abandon the cotton farms. Nor is anything offered, important as it is, as to what would become of the supply should the 34 per cent who did not make a profit abandon the production of cotton.

Vital as every practical student knows it to be, the report is silent as to the living conditions of the laborer that made this "bulk line cost" possible. It would have been most valuable to have had some sort of an estimate as to how much it would have been necessary to advance the "bulk line cost" had the expense of growing the crop been taxed with what it would have cost to provide the cotton laborer with a decent home, decent clothing, decent food and a decent outlook for his family, and also if he, instead of working 14 hours a day and more, had only worked 8 hours a day, as the labor in practically all other fundamental industries were doing.

The report divided the 842 farms covered in the investigation into groups. The average yield of lint per acre and the average cost per pound for each group is given. This figures for the total

number an average yield of 225 pounds and an average cost of 25½ cents. This applied to 160 pounds, the average for the crop grown in 1918 as per official records, makes the actual cost of the crop in 1918 35½ cents per pound. It is interesting to note that, on this basis, the cost of growing the crop of 1919 was from 47 to 50 cents per pound, which is confirmed by the advance in the commodities consumed in production since 1918.

Now there is an urgent call in world conditions for a great increase in the output of American cotton. There is an imperious demand on the part of the American cotton laborer for better living conditions. There is sufficient labor in the South to produce all the cotton the world requires of this country. The independence of the laborer makes meeting his demands an inexorable condition of securing a supply sufficient to meet what is most urgent in the world's needs.

Such is the problem that must be solved. It is not at all obscure. The history of recent years, especially the history of the last five years, makes it plain that when this demand of the cotton laborer has been adequately met the problem of producing an adequate supply will have been solved. The history of these years makes it just as plain, also, that there is no hope of a solution, either in the near future or distant future, on the basis of this "bulk line cost" report by the Government.

This report is the work of theorists. While they are no doubt quite capable in their particular line, they are clearly not equipped to deal with the practical problem of securing an increase in the output of cotton in this country, the solution of which, obviously, dominates in its urgency every other problem connected with the cotton trade.

On the whole, it is safer to assume in all calculations that the imperious needs of the world and the imperious demands of the cotton laborer for a greater share of what he is producing will be the basis on which prices will be determined and the crops liquidated for some time in the future.

Railroads' Responsibility for Present Wasteful Methods of Baling, Handling and Marketing of Cotton

New York, March 30.

Editor *Manufacturers Record*:

I have read with deep interest the several articles that have recently appeared in the *MANUFACTURERS RECORD* condemning the "barbarous" and criminally wasteful methods that have obtained for the past 60 years in the baling, handling and marketing of cotton, and I admire the splendid fight the *MANUFACTURERS RECORD* has made to bring about reforms in these respects. Your editorials and the letter of Mr. W. H. Gatchell, staff officer of the Southern Railway, and the reply thereto by Mr. J. S. Wannamaker, president of the American Cotton Association, which appeared in the issues of the *MANUFACTURERS RECORD* of February 5, March 4 and March 11, are of especial interest to all persons who wish to see accomplished the reforms you advocate. These reforms would be of great benefit to the whole country and would prevent an annual loss, conservatively estimated at \$200,000,000, which falls chiefly on the cotton growers, the balance being absorbed by the users of cotton goods.

The evils and peculations which beset the cotton industry from the time the bale leaves the press until it reaches the hands of the spinner can be corrected by gin compression, and, I submit, by gin compression alone; that is to say, by compressing cotton to its final density at the gin. Cotton compressed at the gin to a high density admits of no further treatment, and can be shipped through from gin or local warehouse to port or domestic mill without interruption or rehandling.

Gin compression fits in perfectly with the admirable plan advocated by the American Cotton Association to warehouse cotton at

gin points or other convenient places and to sell the cotton as spinners need it for actual use, rather than to dump the whole crop on the market in three or four months, as has been the custom for many years, and sell the cotton for what buyers will pay for it. The big flat bale, sometimes called the plantation bale, contains 46 cubic feet; the standard compressed square bale contains 22 cubic feet, and the gin compressed square bale, or two sound bales, contains 15 cubic feet. So it will be seen that the gin compressed bale, round or square, occupies about one-third of the space occupied by the flat or plantation bale and about two-thirds of the space occupied by the standard compressed bale, and, besides, it is a distinctly better fire risk than either of the other bales.

Furthermore, there are less than 300 big compresses, while in 1918 there were 23,439 ginneries, of which 19,259 were active, and in 1919 there were 18,804 active ginneries and probably 8000 to 10,000 ginning points, and it is not practicable to ship cotton from gins to compress and there have it compressed and afterwards reshipped for local storage. This process would subject cotton to all the abuses which now obtain, and besides, freight charges would be prohibitive. Nor does the American Cotton Association's plan admit of building large warehouses at compress points and storing the cotton there. This would defeat the very purpose of the plan.

There are a number of gin compresses, both round and square bale, which have proved their merit. The round or cylindrical bale referred to in your editorial of March 4, 1920, and the system of handling and marketing cotton put up in this form, known as

the "round-bale system," bring into actual practice all of the economic reforms for which you and others of like mind are contending and which is the chief end of the American Cotton Association.

The round bale is 35 inches in length, about 22 inches in diameter, weighs 250 pounds, and has a density of 34 pounds or over to the cubic foot. The round bale is covered with a closely woven burlap, and no metal ties or other bands are used. The covering on a bale weighs $2\frac{1}{4}$ pounds, or 5 pounds on two bales. The tare is 1 per cent, and the round bale is bought and sold in all the principal cotton markets of the world on actual tare. In the operation of the press the lint cotton is blown from the gins through a lint flue into a batformer, and the bat is fed into the press and wound round a steel core between two heavy metal rollers, lap upon lap, under constant pressure, until the bale reaches the required size, weight and density, when the cover is fed into the press and wound around the bale. The bale is then ejected, the core removed, and the heads, made also of closely woven burlap, are sewed on so that the bale is completely covered and no particle of the cotton fiber is exposed. Samples are drawn as the bale is being made, and the cotton is bought and sold on these samples. The bale reaches the spinner in practically the same condition as it leaves the gin, with all markings intact and the covering uncut and free from country damage.

This is the bale which was subjected to the severe fire tests referred to by you and which the National Fire Association called the "underwriter's bale." The bale is practically fireproof. It is absolutely free from "flash hazard," and fire will not "burrow" into a round bale. One of the tests imposed by the underwriters was to force a red-hot iron into the bale and then withdraw the iron, and in every instance when the iron was withdrawn the cotton ceased to burn, as there was no oxygen in the bale to sustain the fire. More than 6,000,000 round bales have been made and marketed, and no fire ever originated in a round bale. On account of the superior fire risk and the good fire record made by the round-bale, the marine fire insurance premium is 7-16 per cent less on the round bale than on the standard compressed square bale.

One of the great economies in gin compression is the saving in transportation, especially in railroad transportation. After an exhaustive research and examination the War Industries Board reached the conclusion and published a pamphlet showing that the handling of 100 standard square bales under the present methods from gin to port or mill requires 16 car days, and the handling of 100 gin-compressed square bales or 200 round bales from gin to port or mill requires only three car days, a saving of 13 car days, or 81 per cent, in handling 100 gin-compressed square bales or the equivalent in round bales. Based on a shipment of 10,000,000 bales from gin through compress to port or mill, this saving is equal to the constant use of 10,833 cars for four months at a season of the year when the demand for transportation is greatest to move the crops and other products of the country, and a corresponding saving in engines, fuel, train crews, trackage and other railroad equipment.

It is possible to load into a standard 36-foot boxcar 35 plantation bales, 75 standard compressed bales, while gin compressed square bales will conveniently load 100 bales to the car, and round bales will conveniently load 200 bales to the car. This means a tonnage for the plantation bale of $8\frac{3}{4}$ tons, for the standard compressed bale $18\frac{3}{4}$ tons, and for the gin compressed bales 25 tons. On account of this saving in space the ocean freight rate on gin compressed cotton is 25 cents per 100 pounds less than the rate on the standard compressed square bale. This ocean freight differential was fixed by the United States Shipping Board and obtains on practically all transatlantic shipments from Gulf ports. This saving of one-third of the space in the shipment of gin compressed cotton as compared with the standard compressed bale, for which steamships allow a differential of 25 cents per 100 pounds, is far less than the saving to railroads in shipping cotton directly from gin to port or mill as compared with the usual method of handling cotton under the present system of compression in transit. As is shown above, the total saving to railroads in car days in handling gin compressed cotton is 81 per cent, and it was conclusively shown in a case before the Interstate Commerce Commission in 1915 that the gross ton revenue from handling gin compressed cotton was 115.5 per cent over the gross ton revenue derived from handling standard square bales under the prevailing custom. Moreover, it must be borne in mind

that in carrying or storing a standard 500-pound compressed bale you are carrying and storing only 470 pounds, or 94 per cent, of cotton in a bad bale, badly covered, and subject to country damage, and that in carrying or storing two round bales of equal weight you are carrying and storing 495 pounds, or 99 per cent, of net cotton in good bales, completely covered, free from country damage, and of superior fire risk.

Notwithstanding these great economies in transportation and the economic savings in gin compression, the railroads make no allowance in freight rate on gin compressed cotton. They do allow 10 cents per 100 pounds when cotton is shipped in less than carload lots, and 15 cents per 100 pounds when shipped in carload lots, for reducing the square bale at compress from 46 to 22 cubic feet, which allowances apply also to gin compressed cotton, but they refuse to make any allowance for reducing the contents of a bale from 22 to 15 cubic feet or for the other savings in transportation which go to make up the total saving of 81 per cent in moving gin compressed cotton as compared with moving standard bales under prevailing methods, or for the improved bale which they so strongly advocate and do nothing to encourage, or for the decreased fire hazard in handling gin compressed bales. On the contrary, acting either under pressure from within or from without, the railroads have vigorously, if not viciously, fought every effort made by the gin compress people to obtain favorable rates from State Railroad Commissions and from the Interstate Commerce Commission.

In a recent case before the Interstate Commerce Commission the cotton-carrying railroads of the South and West were represented by scores of able attorneys and high railroad officials at the hearings before the Examiner at Duluth, Minn., and at Galveston, Tex., and at the argument before the commission at Washington, and these same attorneys filed tomes of briefs in opposition to any reduction in freight rates on gin compressed cotton. They admitted and were willing to receive the great benefits derived by them from gin compression, but they were unwilling to make any concessions in freight rates or in service on account of these benefits, or they were afraid to grant any such concessions over the opposition of the big compress corporations, the Bagging Trust, the Tie Trust, and those handlers of cotton who grow rich under the present wasteful methods, all of whom were represented in the trial of that case.

The gist of their contention was that to grant any concessions to gin-compressed cotton would destroy "vested interests"; in other words, that to grant fair, just and reasonable rates on gin compressed cotton would result in the universal adoption of this method of baling and handling cotton and thereby relegate the big compresses to the scrap heap and put out of business those other middlemen who prosper so stupendously on the waste and abuses of the cotton industry under present methods. The savings from gin compression on the whole crop in one year would more than pay for every square bale compress in the United States, and in a few years these savings would be sufficient to build good roads through all of the 899 cotton-growing counties in the South and West and a fireproof warehouse at every gin, and yet the railroads and those who stand with them in *pari delicto* are bold enough to declare that this great burden of waste should rest upon the cotton growers rather than to disturb "vested interests" which are a drag upon commerce, or to interfere with the well-established and highly profitable business of the middleman, whose occupation would be gone if all cotton was compressed at the gin. If the principle they invoke should be adhered to generally there would be no progress or improvement in processes or in business methods.

The railroads complain of the disreputable bale as now produced, which is indeed a national disgrace, and proclaim that they will do all in their power to bring about needed reforms, and yet when put to the test they have done absolutely nothing. The cotton-carrying railroads are chiefly responsible for the bad bale and the bad methods of cotton handling, because by granting fair, just and equitable rates on gin-compressed cotton, shipped direct from gin to port or mill without rehandling, they would bring into universal use this improved and economical way of baling, handling, storing and marketing the South's great crop, and while lifting the great load of loss and waste under present methods from the shoulders of the cotton growers they would substantially increase their own net earnings by reason of the transportation economies of the gin-compress method.

PAUL JONES.

Preferential Freight Rates Urged as Means to Enforce Better Baling and Cheaper Hauling of Cotton

American Cotton Association, National Headquarters.

Atlanta, Ga., March 29.

Editor Manufacturers Record:

On March 8 Senator Joseph E. Ransdell of Louisiana introduced in the United States Senate the following bill:

To regulate interstate shipments of cotton and for other purposes.

"Be it enacted by the Senate and House of Representatives of the United States of America, in Congress assembled, That the Interstate Commerce Commission shall establish and enforce preferential rates on shipments of cotton based upon the cubic contents of the bale. In reaching its decision the commission shall take into consideration the density of the bale, the amount of space it occupies, its uniformity in size, the character of its covering as a safeguard against damage or fire, and any other points that seem fairly to entitle it to favorable discrimination."

This bill proposes to enforce by Federal regulation preferential freight rates on cotton when shipments of cotton bales comply with four separate and distinct provisions of the bill. These four provisions are density, space occupied, uniformity and covering. The object and purpose of the bill is to encourage the system of high density gin compression and prevent unfair discrimination by the railroads in favor of the large recompress plants.

High density in a bale of American cotton does not mean a density equal to that of the Egyptian or India bale. The Egyptian and India gin-compressed bales have a density of from 40 to 50 pounds per cubic foot, because of the very long overseas haul from those countries to consuming markets. What is needed in this country is a density and uniformity of package only sufficient to meet the tonnage loading requirements of an average 36-foot box car at the initial points of shipment. Gin-compressed bales, uniform in dimensions, either round or square, with a density of 28 to 29 pounds to the cubic foot, will easily load 100 bales to the 36-foot box car, or a gross tonnage of 50,000 pounds. This is not possible with the recompressed bales, because they fail in uniformity. With the present low density gin bales it requires three box cars to carry 100 bales from initial points of loading to the large compress plant. Therefore, the question of uniformity in figuring on space occupied in a car is of very great importance in determining the density at the gin. This is important, because the cost of the machinery and the power required depend in some degree upon the relative density which must be secured.

The steamship lines now require American bales to have a density of from 32 to 33 pounds per cubic foot, which necessitates practically all cotton recompressed in the interior to be again recompressed on a high density Webb press at the ports at a cost of \$1.25 per bale. This fee, added to the 75 cents per bale for recompressing in the interior, adds a fixed charge for securing density requirements by the steamship lines of \$2 per bale. Uniform bales of only 28 pounds per cubic foot will load more tonnage in the hold of a vessel and occupy less space than the high density recompressed bales having a density of 32 pounds to the cubic foot. There is no necessity, therefore, for the gin compress to enter into competition with the high density Webb press, now in use at the ports, to meet the requirements of steamship lines. The whole question, therefore, resolves itself into tonnage requirements in space occupied both for land and water transportation, and not upon the maximum density per cubic foot in the bale.

I have endeavored to make these points clear because the fight of the recompress owners against the Senate bill will be largely based upon present maximum density requirements at the ports. In order to place as heavy a burden as possible on the interior gin compress. This rule is already in force against round-bale gin-compressed cotton shipped out through the port of Galveston.

Covering of Bale Important.

The proper covering of a bale of cotton is of tremendous economic importance. At the present time only about 37 per cent of the outer surface of a bale of cotton is covered. This leaves practically two-thirds of the outer fiber of the bale exposed to the

damaging influences of weather, dirt, trash and dangers of fire. That portion of the lint which is covered with the jute bagging becomes mixed with the jute fiber and has to be combed off at the mills and sold as waste at a heavy loss in price to the spinners. There is also a heavy loss in that part of the lint fiber which has no covering at all. The United States is the only large cotton-producing country in the world where coarsely woven jute bagging is used as a covering for the crop, and the annual losses to the American cotton growers from its continued use amounts to many millions of dollars. It is also extremely objectionable to the spinners, because of the reason stated above, the heavy weight in tare and its absolute failure to properly protect the lint fiber in handling from the gins to the cotton mills. It is, however, about the only kind of covering which can be used under the existing methods of baling and the bad treatment to which the bales are subjected.

The gin-compressed bale will readily take a covering of light, closely-woven burlap or cotton oznaburgs, 16 ounces to the yard, and be of a standard uniform weight when applied to all bales, whether round or square, regardless of the weight of the bale. This would bring about the net weight contract in the sale of cotton by the growers and relieve them of the heavy burden and unfair arbitrary rules regarding a maximum percentage of weight deducted from each bale for tare, as has so long existed in the trade. A closely-woven bagging, completely covering the gin-compressed bale, would protect the fiber from damage in handling and reduce the fire hazard to a minimum. Hence, the question of proper covering is an exceedingly important economic matter in the bill introduced by Senator Ransdell.

Necessity for Compression.

The two prime needs for high density cotton bales is for economic transportation and storage. If the necessary density can be economically and practically applied to the bales at the gin plant, then unquestionably there should be a universal demand for gin compression, regardless of the vested interests of the large recompress plants and the old-fashioned rules and regulations of the organized cotton trade. If the baling and handling of the American cotton bale has come to be considered national disgrace, then it is time the Congress of the United States placed upon the Federal statutes laws to protect the chief staple commodity of this country from continued unpardonable abuse. The great masses of the people, who are the consumers of cotton goods, are as vitally interested in the application of economic reform as are the growers, transportation companies or the spinners.

If two-thirds of the present rolling stock employed in the initial movement of the crop can be saved through high density gin compression, then the system should be encouraged by every railroad operating in the cotton belt. If twice the present number of cotton bales can be stored in the warehouse, then, as an economic storage proposition, the system should be encouraged. If a bale of cotton can be completely covered at the ginhouse and made ready for cheap storage or direct shipment to the consuming mills without the present heavy losses of rehandling, mutilation for samples, loss from waste, dirt and trash, unquestionably such a system of baling should be encouraged in every way possible. If the railroads can haul in one car loaded with gin-compressed cotton, billed to destination, as much tonnage as it now takes three cars to handle, with the extra expense of rehandling at the concentrating recompress plants, undoubtedly the railroads would be willing to grant a preferential freight rate in favor of such loadings.

As it is, the South has never had but one rate on cotton shipments, which was the maximum rate for haulage. Furthermore, the railroads have always enjoyed the right to dictate points at which the plantation bales could be recompressed, and out of the maximum rates they have allowed the shippers the cost of recompression. This old system is totally unfair to the cotton industry, and should no longer be permitted.

Senator Ransdell's bill opens the way for a proper and definite solution of these vexed problems of the cotton industry. The in-

tent and purpose of the bill will no doubt be bitterly fought by certain vested interests of the cotton trade. But the bill is intended to render a great service to the cotton growers and the mass of the American people, and should therefore be supported by every Representative in the National Congress and the general press of the country.

HARVIE JORDAN,
National Campaign Director.

Mississippi Long-Staple Cotton at \$1 a Pound.

Memphis, Tenn., April 5—[Special.]—Twenty-three bales of a long-staple cotton produced at the edge of the Mississippi delta region near Yazoo City were sold several days ago by R. M. Nicholas of Vaughn for \$1 per pound. The bales averaged a little more than 400 pounds.

The cotton is a variety which Mr. Nicholas has experimented with at the edge of the delta on land considered hill rather than delta land. He sought to get a long staple, which the delta alone has produced with success, and started with one stalk, cultivating and producing his own seed until he grew enough for the 23-bale crop this past season.

Remarkable Cotton Yield Reported from Georgia.

An \$11,000 cotton crop from 30 acres of red-clay lands in Northern Georgia is said by the Atlanta Journal to have been raised by W. B. Hunter of Cornelia. It is stated that Mr. Hunter has developed a variety of extra staple cotton with a fibre of a full 1 3/16 inches length, and that this cotton was sold at 82 cents a pound. The cotton, seed and lint, is said to have averaged \$360 an acre. This same land, so the Journal reports, was sold not so many years ago for 25 cents an acre. Careful seed selection, with an early maturing long-staple cotton grown in Mississippi as a foundation, is said to be the basis of the remarkable achievement by Mr. Hunter.

Increasing Number of Farms in Arkansas, With Slightly Smaller Acreage Per Farm.

Memphis, Tenn., April 5—[Special.]—Less than 10,000,000 acres of the 18,000,000 acres in farms in Arkansas are "improved," says a new report by the United States Bureau of Crop Estimates. The report indicates that almost every farmer has about one-half of his land in cultivation, while the rest is yet to be "spruced up."

Other figures give very hopeful indications of the development and cultivation of idle lands in the State. They show that more than 1,000,000 acres of improved farm lands have been added since 1918, which was about the gain made during that year. This indicates a rapid turning to new land and bears out reports that the extensive drainage and clearing of the so-called rich bottom lands is progressing rapidly.

The figures likewise show that there are some 20,000 more farms in the State at the close of 1919 than in 1918, while the average size of each farm was reduced from 81.1 acres in 1918 to 78 acres in 1919. On the average farms of this size 41 acres now are improved, as against 38 in 1918.

These figures would indicate that reports are true which say that the old plantations of big acreage are being cut up into smaller farms, due not a little to subdivision and sales to hundreds of farmers who have come to the Lower Mississippi Valley from older farming regions where land values now are virtually out of the reach of the "little fellow" and where the investment is so large that the margin of profit is small.

Corn acreage was slightly larger than the cotton acreage in 1919, being 2,797,000 as against 2,570,000 in cotton. Hay and forage was grown on 687,000 acres; oats, 420,000; wheat, 340,000; rice, 150,000; potatoes (Irish and sweet), 87,000.

Potatoes led in value per acre, yielding \$105, while rice was second with an acreage value of \$98.60. Cotton ranked third, \$56.65 an acre. The new land under cultivation in 1919 was put to cotton and corn on about a fifty-fifty basis.

The Birmingham (Ala.) Steel Corporation has taken on several contracts for structural fabrication work.

Scientific Marketing Method Sought for Pecans.

Austin, Tex., March 31—[Special.]—The fact that Texas produces three-fourths of the world's supply of pecan nuts and that the industry has made giant strides during the last few years has awakened to growers the necessity of a State organization to improve the marketing conditions and bring about a more scientific handling of the business along its various lines. To meet this demand a meeting of growers has been called for May 20 at Brownwood. At a recent meeting held in San Antonio the Southwest Texas Pecan Growers' Association was organized with Ike T. Pryor as president, T. H. Ridgeway, vice-president, and Ralph Durkee, secretary.

It is stated that under shipping conditions as they exist at present the pecans are sent out of the State without any attempt to grade them, with the result that hard, scrubby little nuts are seen in Eastern markets and big, paper-shelled pecans are kept at home and shelled here.

Men back of the movement to organize a State-wide association declare that because of the great distances in Texas there should be subcenters of marketing, grading and shelling, with one principal marketing center.

It is estimated that only one-tenth of all the trees in the State produce, and the nut culturists of the Federal and State Agricultural departments declare that budding and grafting will remedy this.

Considerable importance is attached to the selection of Colonel Pryor as the first president, for there are nearly 20 miles of pecan groves on his ranches, and he is probably the largest pecan grower in the State, if not in the world.

Broadening the Work of Commercial Organizations.

Memphis, Tenn., March 24—[Special.]—Three cities in Mississippi have broadened their Chambers of Commerce to include the whole country about each city, notably Greenville, Charleston and Canton. Each organization hereafter will be known as a county instead of a city organization, and each will work for county development as they have in the past worked for city development.

The growth of the Chamber of Commerce at Greenville, Miss., has been remarkable. It has just completed its transition from the old city club to the county club idea, and with a growth and revival of interest that is not only unusual but more of less typical of the way other cities in the Lower Mississippi Valley are doing things. It has the backing, both in moral support and in working funds, to go ahead with a project for putting in a great power river terminal on its fine river front—a wharf of brick and concrete known the full length of the Mississippi as a model. The chamber is back of a move to build a fine city park along the river front where there now are "shacks." The chamber has helped to obtain a tract of land near the corporate limits, where another fine park will be laid out. Streets are being paved, \$75,000 in sewer extension made, a \$70,000 city hall constructed, \$150,000 theater insured by an organization aided and backed by the chamber; a housing corporation is building \$100,000 worth of new homes, and the city is aiding in road-building projects totaling \$2,225,000 in Washington county.

Cocoa Products Branch Factory for Mobile.

Mobile, Ala., April 5—[Special.]—The Franklin Baker Company will establish a branch factory at Mobile. The information received confirmation when property in the city formerly used by the Bienville Brewery was bought for such purpose. Company engineers are to arrive here within 60 days to plan construction of necessary buildings. The company is admittedly the largest manufacturer of coconut and cocoa products in America, and will import a large amount of these raw products through this port.

New Orleans Distributing Plant for Beekeeping Supplies.

The A. I. Root Company of Medina, O., the largest manufacturers of beekeepers' supplies in the United States, have established a distributing plant at New Orleans. The company plans to begin an extensive campaign for the development of the industry in Louisiana, Mississippi, Alabama and Florida.

Cotton Raising in British Possessions Subject of Much Discussion in English Papers

AMBITIOUS TO BECOME INDEPENDENT OF AMERICAN SUPPLY—RESPONSIBILITIES OF BRITISH POLICY OF EXPANSION BECOMING MORE MANIFEST—WORLD SHORTAGE OF RICE KEENLY FELT.

[Special Correspondence Manufacturers Record.]

London, March 16.

Interesting questions have been asked in the House of Commons about cotton growing in the Sudan and the important facts which were disclosed are that £1,000,000 was spent on this enterprise last year, and that the Sudan Government is fully alive to the importance of proceeding with the work with all despatch. Northeast Africa, it was said, provides exactly the class of cotton that is in great demand in the Lancashire mills.

Eight years ago the British Cotton Growing Association and the International Cotton Federation extracted from the British Government of that day a promise, which was duly fulfilled, that the British Treasury would guarantee a loan of £3,000,000 to be raised by the Sudan Government for cotton growing in the Sudan. Mr. Asquith said at that time that the Government had come to the conclusion that the prospects of utilizing this part of the world for cotton growing were probably at least as great as those of any other unexploited spot of similar size in the world. Nothing that has happened since then has led the Government to an alteration of this view.

Cotton Trade Wages.

The time is rapidly approaching when the operatives in all branches of the cotton trade here, numbering about a half million, will disclose the terms of their applications for an advance of wages.

The cotton trade, say the operatives, shows no signs of falling away from the highly profitable stage that it has reached. In some of the Lancashire districts extremists among the operatives are agitating not only for an advance at the rate of 130 per cent of the present wages, which is about five times more than the pre-war rate, but for a 40-hour week also.

The refloating of mills continues, but it is on a scale much smaller than that of a few weeks ago. The change is due in part to increasing caution on the part of the banks, which are beginning to arrive at the opinion that the buying and selling of mill business has been considerably overdone.

People who have been astonished by the large sums that have been paid for the ordinary shares of cotton mills (in some cases as much as 15 to 20 times their normal value) may be reminded that in these cases the ordinary share capital was comparatively small, and that the concerns were run largely on money that was borrowed at about 4 per cent interest. In many instances purchasers of original shares invested twice as much money in loans as they invested in shares, this being one of the conditions of the purchase. And today large amounts of loan money are being placed in spinning mills at as low a rate of interest as 5 per cent, the investors calculating on getting more than square by swinging dividends on ordinary shares.

Nile Irrigation Trouble.

The Nile Projects scheme has proved so ticklish a problem as to cause even so able an engineer as Sirry Pasha to resign rather than be saddled with the responsibility for it.

The whole distrust of the scheme arises in a rather curious way. There are Egyptians at Cairo who will not admit that the British-inspired irrigation scheme for Lower and Middle Egypt has brought a relative substantial amount of benefit. They hold that the irrigation of the land has depleted its productive power.

The British explanation of this is that it is due to the rapacity of the fellahin, who, they allege, have forced the soil to grow three and even four crops in a year where only one grew before. The consequence is, say the British, that the land has not had time to lie fallow, and therefore is not as rich as it was.

The resignation of Sirry Pasha will have the effect of delaying

cotton planting schemes which the British Government has projected for the region to be irrigated.

Cotton Bills and Exchange.

Cotton bills are an important factor in the American exchange at the present time, how important may be realized from the fact that American cotton which fell to 4½ per pound in December, 1914, now brings for "fully middling" over 30 pence per pound. Lancashire now consumes 300,000 bales of 500 pounds each per month, worth well over £15,000,000, as against £4,000,000 before the war.

The British February trade returns also show how important the imports of raw cotton are as a factor in the exchange market. However, we hear it said among bankers, the American exchange should continue to rise if the United States can continue to outbid other buyers for gold.

Cotton Mills to Pay More Rates.

Urban rate payers have before them the unpleasant prospect of a larger addition to the rates, but for the householder in manufacturing areas, and especially in the cotton manufacturing district of Lancashire, the outlook is not so disturbing. The relative immunity of the householder is being secured at the expense of industrial and commercial undertakings. While the Rent Restriction Act remains in force the assessment of most house property must be stationary, but the reassessment of factories and warehouses is going on steadily.

An indication of what this means is supplied by Oldham, a town where cotton mills constitute a little more than one-sixth of the total rateable value of the community. The mills there have not yet been reassessed, but the Master Cotton Spinners' Association has agreed to the immediate increase of all mill assessments by one-third. The cotton mills will, therefore, in the coming year yield not one-sixth, but two-ninths of the town's revenue. With such an increase of the rateable value, the municipal expenses might be increased by 6 per cent without any necessity for increasing the amount of the rates.

This is not the end of the matter, for the rating authorities smile at the idea of this addition of 33 per cent to the cotton mill assessments being anything but an instalment of the ultimate increase which is to be fixed in the course of the next 12 months.

The assessments of industrial works is going to be further increased in another way. In Lancashire it has not hitherto been the practice to rate the machinery as such; the rateable value of a building has been increased by its equipment with machinery. It has recently been determined, at a conference of assessment committees, that all machinery shall hereafter be separately rated. This is a reversal of policy, due primarily to a decision in the King's Bench Division of the Courts last May, which requires the assessment of a factory with machinery in it to be based upon what a hypothetical tenant would give for the right to occupy the building and use the machinery. There is a difference of opinion as to the increase which the assessment of machinery will make in the rateable value of a cotton town, but on a conservative estimate the net effect must be large.

"The Penalties of Expansion."

"The Penalties of Expansion" is the title of an editorial in the London Observer of March 14, which is quoted in full in the belief that it will be of general interest. The Observer says:

"The truest and sincerest of all the high professions under which this nation entered, waged, and won the war was certainly that which disclaimed any desire for territorial acquisition. Germans who described our 'sated imperialism' paid unconscious tribute to our honesty. It was, in fact, the absence of ulterior

aims and the simplicity and greatness of its single purpose, the defense of democratic civilization, which set this war apart from other wars in the eyes of the British peoples and claimed their unquestioning sacrifices. Now at its conclusion we find ourselves for better or for worse, committed to fresh expansion. It is not expansion in the old sense. The additional responsibilities come not by way of annexation, but by way of mandate. They come to us not as owners, but expressly as trustees. They are not the less onerous for that. They have not been asked for. That is, there has been no popular demand for them. We have acquired them almost in the traditional 'fit of absence of mind.' There has been no disposition to dwell on the material advantages of the vast extension of British rule which we have tacitly accepted. Rather, as the nature of the Paris dispensation comes to be examined more and more closely in parts of the world other than Europe, the British public is beginning to estimate a little anxiously the extent of its commitments.

"The bulk of the German colonial possessions are entrusted to us. We have made ourselves responsible for new territories in the Pacific, for vast tracts in East and Southwest Africa, and, above all, in the distracted area of the Middle East. Britain, struggling under the severe economic pressure of the after-the-war days, is disposed to insist on the burdensome character of these 'acquisitions.' Her friends and her late enemies are prone to discuss them in terms of oil, cotton and other natural riches awaiting exploitation in these regions. American opinion on the Constantinople question is colored by similar suspicion of the Government's good faith, a suspicion assiduously fostered by those whose business it is to make mischief between the United States and ourselves. Yet no one, neither of those abroad who complain of our imperialism, nor of those at home who see and fear the novel dangers of our prolonged and exposed land frontier in Asia, can offer a real alternative to the settlement which is slowly shaping itself. With the collapse of the Turkish Empire collapsed also the last semblance of unity in the variegated complex of races and religions which inhabit the Middle East. It falls to the Western Powers to intervene with their support until a higher form of civilization, of which Turkish rule was the perpetual denial, has based itself securely on a group of thriving and self-reliant national States. No European Power could or would have undertaken that immense task single-handed. An American mandate for all or any part of the territories of the Middle East would have been hailed with eager satisfaction. But the acceptance of a mandate by America rapidly became a remote improbability, and the present settlement, in general outline, inevitable.

"None the less, we do well to weigh anxiously the grave burdens we are accepting and to justify their acceptance to our own consciences as much as in our neighbors' eyes. If oil and cotton and material wealth are the last words in our Middle Eastern policy, it will have to be drastically revised. No commercial advantage is comparable to the risks involved. The British Commonwealth will have exchanged the security of its sea borders for a land frontier along the southern fringe of Asia difficult to draw and hopeless to defend. Three thousand years of history cry aloud their warning of the fate which has attended every attempt to dominate the basin of the two great rivers. We are undertaking to control it at a time when we can ill afford the money and still less the men that the enterprise demands. At a time when the growing complexity and intensive organization of national life at home and in the Dominions requires the service of the best brains the Commonwealth can produce, the needs of newly adopted territories all over the world will be competing to drain us yet more heavily of administrative talent. The strain of government will be intensely severe. If we cannot draw back, it is not because the attractions of petroleum are overpowering, but because as the professed and willing organizers of order and progress among undeveloped races we cannot refuse the task which offers. But it is not one to be entered on with a light heart."

South African Cotton-Growing Possibilities.

All the London papers are devoting great amounts of space to the possibility of the British Empire producing sufficient cotton to make it independent of America for its supplies. Some of the views are very amusing as showing a terrible ignorance regarding the subject. Occasionally one comes across an intelligent survey.

One writer is now engaged in considering the possibilities of growing cotton in South Africa.

"I have no hesitation," he writes, "in saying that cotton can be profitably produced in the coast districts of the South African Union. I believe that with adequate financial support and with efficient organization it would be possible to get 1000 acres under production within 12 months and 5000 acres in two years. This could be achieved under conditions best calculated to assure the permanence of the industry without purchasing a single acre of land. I estimate the districts I am chiefly concerned with could yield 50,000 to 60,000 bales of cotton of the grade British spinners require annually.

"There is no doubt that the South African Government would willingly provide sufficient land to provide for the establishment of the necessary small experimental stations at a nominal quit rent, providing the effort behind them was sincere and substantially backed. If such a station could be permanently established at, say, East London (South Africa), the system adopted should be to approach the farmer with an offer to temporarily subsidize his effort. At present the main crop is mealies (maize), which ranks slightly lower in value than cotton, but is infinitely more easy to grow.

"To induce the landowner to put an acreage under cotton he should be offered a contract of from £2 to £4 per acre advance, the larger sum where new lands were cleared for the purpose. All farmers would not require or desire this. Approved seed and fertilizer should be provided, and the agreement should stipulate that the methods of cultivation and treatment laid down must be adopted. Any such establishment as I suggest should own a round dozen light motor plows, which on work at fixed rates would easily pay their way. A staff of traveling advisers, whose headquarters would be the experimental station, would periodically visit the various farms and give expert assistance when necessary.

"The crop should be taken 'in account,' ginned and baled at the experimental station or at the port and shipped direct. The organization necessary to achieve these objects would, of necessity, have to be able to purchase the crop when required and generously finance the industry in its inception, having due regard for the protection of its own interests and any cash advanced and seed, etc., supplied. The subsidy should at the outset be interest free and recoverable from the crop over a period. The development and extension of the industry would necessitate the establishment of other stations as expansion demanded.

"I have purposely refrained from alluding to the prospects in parts of Natal, Zululand or even in the Mozambique territory, all of which districts have great potentialities.

"The district I refer to has been proved as suitable for the crop; the initial outlay involved in extensive irrigation schemes does not come into the calculation, as the natural rainfall is just correct—from 30 inches to 40 inches. Transport is established and native labor is abundant. Whatever the ultimate prospects in undeveloped portions of Egypt, Mesopotamia and other countries may be, the Union of South Africa offers the advantage of being prepared to produce now without the necessity for lavish speculative outlay.

"The farms I have alluded to average in extent from 1000 to 5000 acres, but it is not to be supposed for one moment that this acreage is or could be made, arable land. In many cases quite a big farm contains only a few hundred acres which would be of any use.

"There is no possibility of getting vast territory under cotton; the cotton crop would have to take its chance in rotation with others. But this rotation is most desirable to secure and should give the yield I have estimated if steps were now taken to encourage production.

"For some reason or other, for which I am unable to account, South African merchants do not view the development of the industry with too much favor. Their support has always been very half hearted. But in this respect they have been no worse than the actual traders who require the raw cotton as the essential base of their business."

The concluding paragraph is illuminating. Perhaps these South African merchants and farmers are taking heed of the experiences of our own American cotton planters, and that this accounts for their half-hearted support.

World Shortage of Rice.

The rice growers and others interested in rice in the Southern and Southwestern States of America will probably find much to interest them in a review of the world's rice position undertaken by the British Government on behalf of the India Office. This review shows how serious is the world shortage of rice.

Announcement was made in the House of Commons of concessions made to Ceylon in the price of part of the rice allotment to the island. This has a direct bearing on the circumstances in which control of Burma rice has been maintained and on the apparent anomaly of the advance in England from the controlled retail rate in war of 4d. to 7d. in peace.

The outstanding fact in this connection is that rice is the principal food, to the almost entire exclusion of other staples, of more than half of the vast population of the Indian Empire, and also enters very largely into the dietary of the other moiety. No other product distantly approaches the area normally devoted to this crop; it is more than three times that of cotton and more than double that of wheat. Yet Peninsular India has no surplus to export, and actually competes with foreign countries for the Burma surplus, which is normally about one-third of the provincial crop.

Recent Figures.

In 1918-19 the all-India area under rice fell to somewhat less than 76,000,000 acres, as against 80,000,000 acres in the previous year. But the average yield per acre, which in Burma is normally about 1400 pounds, fell by no less than 314 pounds, with the result that the crop yielded only 23,500,000 tons, as compared with 36,250,000 tons. The difference was due to the defective monsoon of 1918. In consequence of the resulting depletion of stocks, Peninsular India absorbed last year almost the whole of the Burma surplus available for shipment, taking 1,750,000 tons in nine months, while a small amount went to countries having a large emigrant Indian population.

The Burma surplus is ordinarily some 2,500,000 or 3,000,000 tons. This season it is estimated to be about half that average—1,600,000 tons. The two other considerable exporting countries are Siam, which usually ships about 1,000,000 tons, and Saigon, which supplies from 1,000,000 to 1,500,000 tons. This season the Siamese crop is an absolute failure and, supplies being utterly insufficient for internal consumption, export has been prohibited. The Saigon crop is, if anything, beyond the average, but the deficiency of Burma and Siam in exportable surplus is equivalent to at least half the normal supply.

In the present year India's requirements are likely to be much smaller than after the bad 1918 monsoon. The final forecast for the entire crop marks a substantial improvement of nearly 2,000,000 tons, though this falls far short of the normal yield. Late in December the Government of India announced its decision to continue the control of Burma exports through the present year. It was pointed out that, although prices in India ruled high, world prices, owing to general shortage, were very much higher.

The shortage of supplies for starch is regarded here, as the most serious part of the whole situation.

The Federal Reserve Board and Wall Street.

In a letter to the MANUFACTURERS RECORD, Mr. William C. Seddon, a Baltimore stock broker, in writing about the question of interest rates and the effort of the Federal Reserve Board to deflate the stock market, says:

"It seems to me that one cause for the high rate arises from profiteering. Just think of the enormous earnings of the banks all over the country. The Reserve Bank's policy of advancing rates, of course, accounts for its large profits, and the practical auctioneering of money by the New York banks amongst the stock brokers easily accounts for the large profits made by these institutions. Great is the cry against speculation in Wall Street. I would submit that the transactions in stocks do not change the volume of money in the banks one iota. Suppose Mr. Smith buys \$100,000 worth of stocks from Mr. Jones, does not Mr. Smith give a check on his bank for the money, and does not Mr. Jones deposit it in his bank? Has this changed the amount of money in the city of New York? And yet the New York banks get together and allow only the highest bidder to have funds with which to operate in stocks. Often the rate at the beginning is as high as 18 per

cent per annum, and before 2 o'clock the demand being supplied, the rate drops to 6 per cent with no demand.

"The matter is different when a manufacturer borrows money. He gives his 90 days' or four months' note for \$100,000 loan. This money is used for paying his operatives, for buying raw materials, machinery, etc. The goods are manufactured and then sold. This all takes time, and the borrowed money will be scattered not only in his community, but wherever the raw materials are purchased. Again time must be given to collect for the goods sold. When all this has been done, he has funds gotten together to pay his loan and the bank gets back the \$100,000 which has been tied up. Of course, the volume of money has not been changed in this case, but it has been scattered to such an extent that it no longer can be used for banking purposes until gathered together. Not so, as explained above, with stock exchange transactions. Why, then, does the Reserve Bank put its foot down so hard on Wall Street?"

Why a Florida Banker Does Not Favor Plan to Force Liberty Bonds Out of Hands of Small Holders.

Florida National Bank.

Jacksonville, Fla., April 1.

Editor Manufacturers Record:

Your favor of March 5 has remained unanswered owing to my absence from the city and other causes.

While I presume my answer would not be of interest at this time, I will say that I am not in sympathy with the Baltimore banker who advocated the forcing of the Liberty bonds out of the hands of the smaller holders and the banks, and into the strong-boxes of big estates, insurance companies, etc. I do not favor it for two reasons—first, that it would not be keeping good faith with the American people, who during the necessity bought them, and secondly, because the purchase of them by the masses has been a great lesson in saving, which would be partially lost if they were forced to dispose of them.

This institution encourages the holders to retain their bonds and pay for them out of their earnings, thereby accumulating an asset upon which they can readily borrow when necessity demands.

ARTHUR F. PERRY, President.

Mutual Savings Banks to Hold Conference.

The first annual conference of representatives of mutual savings banks in the United States is proposed to be held at Boston on April 23, according to announcement by the New York State Savings Bank Association, which says that bankers from each of 17 States having mutual savings banks will be present, and that already 225 bankers have promised to attend. It is anticipated that more than 300 will be on hand. Matters of common interest are to be considered. Among the speakers expected are Congressman John J. Esch, on the Railroad Act; S. Davies Warfield, president of the National Association of Owners of Railroad Securities, on the financial section of the Act; Dr. Irving Fisher of Yale University, on "Savings and the Unstable Dollar," and Wm. E. Knox, whose subject is "Mainly About Savings Bankers." There will be a round-table for open discussion of all matters of current interest to savings banks. Governor Calvin Coolidge of Massachusetts will also address the conference.

New National Banks Chartered.

The Comptroller of the Currency reports that during the first three months of this year there were received 166 applications to charter new national banks with aggregate capital of \$10,990,000, as compared with 96 applications and \$7,280,000 capital in the first three months of last year. Four applications have been refused this year, and three were refused during the same period of 1919. Since January 1, 1920, 95 charters were granted, with total capital of \$8,730,000. Last year in the same time 44 charters were granted with \$2,225,000 capital. Among the applications pending for charters there were on March 31, 1920, the following: Seven from Arkansas, 11 from Virginia, 6 each from South Carolina, Florida and Alabama, and 19 from Texas.

Subsidiary of Royal Dutch-Shell Syndicate to Expend \$8,000,000 for Oil Developments South of Tampico.

Tampico, Mexico, March 23—[Special.]—An expenditure of approximately \$8,000,000 gold is to be made by the Corona Oil Co. at Chijol, situated a short distance south of Tampico. This enormous sum of money is to be used by the company in the construction of a refinery, shipping terminals, loading racks, storage tanks, administration building, clubhouses, public service plants and 268 residences for its employees. The complete plans for this new industrial center have just been finished by Paul Lightvoet, architect, of the City of Mexico, and have been approved by the officials of the company. It is announced that in the layout of this new community special provision is made for the welfare of the families of the Mexican laborers. The plans call for the erection of a large school building, which will be built and equipped along most modern lines, including athletic apparatus and playgrounds. The school will be conducted at the expense of the company. The homes of the employees will consist of 20 residences for the officials to cost \$8000 each, 50 residences for mechanics to cost \$5000 each and 198 residences for the laborers to cost \$3000 each. All of these homes will be built along sanitary lines, and with the idea of the greatest possible comfort for the families occupying them.

In the large clubhouse will be recreation-rooms, reading-rooms, a dancing hall, library and reception-room. The company will build and conduct four stores in the town. The large refinery will cost approximately \$5,000,000 gold, it is stated. At Pueblo Viejo a group of storage tanks, each of 55,000 barrels capacity, will be erected. A loading station will also be built at that place. Material for the big amount of construction work that is to be done at Chijol is now arriving on the ground, and building has already been started.

The Corona Oil Co. is a subsidiary of the Royal Dutch-Shell syndicate, and has been operating extensively in Mexico for several years. It is stated that it is not to be merged into the Mexican Aguila (Eagle) Oil Co., although the Royal Dutch-Shell interests acquired control of the latter several months ago by the purchase of the holdings of Lord Cowdray in that company.

It is reported here that Lord Cowdray retired from the Mexican oil industry because of the alleged antagonistic attitude of the Carranza Government toward the Mexican Aguila (Eagle) Oil Co. According to advices just received here, he has become the head of a new British syndicate which plans to invest \$25,000,000 in petroleum exploration and exploitation in the Comodoro Rivadavia district of Argentine, South America. These fields are situated about 1000 miles by sea from Buenos Aires, in the extreme south of Chubut Territory, and are close to the shore. Roughly, the yield is now 700,000 barrels per annum, though recent official statements put it at 28,000 barrels a week. This is obtained from a relatively small number of wells sunk within a zone of 500 acres which form part of 12,230 acres declared as reserved State oil lands. The consensus is that the oil area is wide and contains a supply capable of being exploited for many years.

Mexican Oil Exports for February Show Decline.

Tampico, Mexico, March 29—[Special.]—Salt-water intrusion is affecting the production of the Penn-Mex Fuel Co. more than that of any of the other concerns operating in the Tepetate, Alamo Petroleo-Alsasia and Casiano fields, where this destructive agency has made its appearance. The output of the Penn-Mex Fuel Co. for the month of February was only 155,218.75 barrels, as compared with 1,098,679.97 barrels for the month of January. It is asserted that the company's production this month will show a 12% increase over that of last month.

The total shipments of refined, distillate and crude petroleum from Mexico during the month of February was 7,867,943.83 barrels, as compared with 8,060,289.67 during the preceding month.

Shipments were made principally to the United States and its possessions, Cristobal, St. Thomas, Porto Rico; to the foreign ports, Argentina, Buenos Aires and Campana; Brest, France; Boca Grande, Brazil, Chili, Pisagua, Astilla, Helic-Roquerno, Cienfuegos, Havana, Matanzas, Manati, Manzanillo, Navitae, Preston Banes and Vita.

Importance of the New Orleans Oil Industry.

New Orleans, La., March 24—[Special.]—New Orleans imported 7,942,376 barrels of crude oil in 1919. This was worth at least \$7,942,376 at only a dollar a barrel. New Orleans exported \$38,983,760 of oil and its products during the same period. Of this less than 500,000 barrels was crude oil. Illuminating oils, however, formed \$17,068,289 of the exports and gasoline \$12,439,158, illustrating what a great refining business is developing here and indicating the possibilities. The different grades and products of oil exported, as well as the extent of the business in New Orleans, are shown in the following tables, as compiled by the Association of Commerce:

EXPORTS OF MINERAL OILS FROM THE PORT OF NEW ORLEANS FOR THE YEAR 1919.

	Gallons.	Value.
Crude oil.....	16,790,322	\$1,569,735
Fuel oil.....	40,708,547	5,083,744
Illuminating oil.....	170,372,065	17,068,289
Paraffin oil.....	4,609,229	581,706
Other lubricating oils.....	9,444,334	1,068,317
Gasoline.....	62,275,024	12,439,158
Other naphthas.....	14,063,730	2,267,312
	318,263,861 gallons or 7,577,687 barrels.	\$38,983,760

OIL REFINERIES IN NEW ORLEANS DISTRICT.

	Barrels of 42 gals. a day.
Freeport & Mexican Fuel Oil Corporation.....	10,000
Pelican Oil Refining Co., Inc.....	500
Liberty Refining Co.....	1,100
Mexican Petroleum Corporation.....	20,000
Total.....	31,600

OIL REFINERIES BUILDING.

Island Refining Corporation.....	10,000
New Orleans Refining Co.....	10,000

OIL REFINERIES PLANNED.

20,000-barrel plant by Simms Oil Co.; 8-inch pipe line from Sibley, La., to New Orleans begun.

Mariand Refining Co. Size of plant not determined.

STORAGE CAPACITY OF OIL PLANTS IN NEW ORLEANS DISTRICT.

	Barrels of 42 gals.
Freeport & Mexican Fuel Oil Corporation.....	375,000
Standard Oil Co.....	110,336
Mexican Petroleum Corporation.....	520,000
Pelican Oil Refining Co., Inc.....	150,000
Louisiana Oil Exporting Co.....	200,000
Galena Signal Oil Co.....	4,000
Indian Refining Co.....	71,429
Export Oil Corporation.....	280,000
National Petroleum Corporation.....	35,000
International Storage & Warehouse Corporation.....	205,000
Mexican Petroleum Corporation.....	300,000
New Orleans Refining Co.....	440,000
Gulf Refining Co.....	275,000
Texas Oil Co.....	150,000
Union Petroleum Corporation.....	600,000
Total.....	3,715,705

Seeking Oil in South Mississippi.

New Orleans, La., April 2—[Special.]—Within recent weeks considerable oil prospecting has been undertaken in the vicinity of Ocean Springs, Miss., and along the route of the Louisville & Nashville Railroad from Pascagoula to Biloxi. There are now drilling a dozen or more wells in this district, none of which have yet reached a sufficient depth for a strike. A group of New Orleans and Chicago business men have organized the Gulfport-Biloxi (Mississippi) Sound District and leased 75,000 acres of land. Their first wells will be drilled on the outskirts of Ocean Springs within the next week. Two test wells are planned to be sunk to a 4000-foot depth, and these are said to be but the beginning of extensive operations in this region.

Heavy Increase in Mobile Bank Clearings.

Mobile, Ala., April 5—[Special.]—Mobile's prosperity is again reflected in the increased bank clearings, local checks not included, in the statement. In March the clearing-house figures showed an increase over 1919 of \$4,456,863.09, clearings totaling \$11,108,489.96 for March, as compared with \$6,651,626.87 for March, 1919.

Excess Profits Tax a Factor in Huge Expenditures Made by Oil Operating Companies in Texas.

Austin, Tex., April 5—[Special.]—It is expected that as long as the excess profits tax remains in effect there will be no decrease in the expenditure of money by the larger oil operating companies as well as other big investment interests in oil exploration in Texas. Many millions of dollars have already been sunk in dry holes in different parts of the State, but this fact has had no apparent effect in wildcat activities. Instead of there being any decrease in the demand for leases of the possible oil rights of land, this phase of the industry shows a constant growth. There are hundreds of men now operating in oil leases in this State. In the purchase or leases it makes little difference whether the land that they cover is situated adjacent to oil production. Practically the whole Western and Southern Texas is now under lease for oil exploration and development purposes. New companies are being organized daily to drill in wildcat territory, and the larger and older corporations that have big holdings are constantly increasing their scope of operations. Some of these well-established concerns are each now drilling as many as 30 wildcat wells, scattered widely apart. It is confidently predicted that before the end of the present year several new fields will be brought in.

The greatest importance is attached to the discovery of a new oil pool in Wilbarger county, about nine miles southwest of Vernon and 15 miles to the northwest of any former production. This well was brought in a few days ago by the Peoria-Prescott Oil Co., in which Peoria (Ill.) men are largely interested. The oil sand was struck at a depth of 2051 feet. Although the well is in an incomplete state, its production is estimated at more than 1000 barrels a day. It is stated that all of the land for many miles around the well is under lease, and that most of these leases are held by the larger companies, including the Sinclair Gulf Corporation, the Texas Company, the Gulf Production Co. and the Home Oil & Refining Co. The latter owns a lease of about 200,000 acres of land in the locality of the new well. The Peoria-Prescott Oil Co. has purchased a tract of land at Vernon upon which it will build a large refinery.

Conditions along the Red River bed in the northwest part of Burkburnett field are still unsettled. However, developments are going on rapidly with Texas Rangers still in charge of all lands lying south of the present channel of the river. South of the town-site of Burkburnett, in what is generally known as the Texhoma district, much attention is being given to the development of the 1300-foot sand. This sand has proven very productive, and, being found at such shallow depths, it is particularly attractive to operators. The wells in this sand are not of the gusher type; hence they do not cause much excitement. There is more than a score of wells in this district now on the pump, most of them averaging between 100 and 200 barrels per well.

In the Eastland-Stephens county territory very little has been accomplished toward the opening of new producing areas. Several new wells, some of them in the big gusher class, have been completed in Stephens county. The largest well of the week is the Boyer No. 1 of the Gulf Production Co. in the Necessity district. This well had an initial flow of 7500 barrels from the Caddo line at a little below the 3200-foot level. Besides being the largest well for months in the field, the Boyer is of particular interest in opening some new territory and practically connecting the Caddo and Breckenridge pools. The well is a mile and a half northwest of the town of Necessity, which is considered in the Caddo field, and about the same distance southeast of the White lease of the Gulf Production Co., which until recently fairly well marked the southeastern limits of the Breckenridge pool. Another good well of the Gulf Production Co. was the Satterwhite No. 1, just west of Necessity, which came in with an initial production of 1200 barrels.

Interest is still at a high pitch in the district immediately north of the town of Breckenridge, where much new production has been brought out within the past two weeks. Leases are being rapidly developed in this section of Stephens county, and it will soon very likely be one of the best producing areas of the county, in the opinion of oil men.

The Cosden Oil Co.'s well on the Mary Timmons farm, five miles south of Graham, in Young county, is still incomplete. There is yet a cave-in of several hundred feet to be cleaned out and the casing landed properly before the well can be called a completion.

The Rio Grande Gulf Corporation, which is drilling a wildcat test for oil near the mouth of the Rio Grande, just across the river from Mexico, about 22 miles east of Brownsville, has a huge California derrick, towering 112 feet in the air. This derrick is reputed to be the largest and most substantially built of its type ever erected in Texas, either in wildcat or proven territory.

The Rio Grande Gulf Corporation was organized a few months ago by Neils Esperson of Houston and associates, Wm. Epstein, E. S. Brodix and Walter McComb of San Antonio. The purpose of the corporation, as was stated by Mr. Esperson at the time of its organization, is to drill a deep test to the depth of 7000 feet, if necessary, in the belief that the heavy petroleum strata, such as exists in the Tampico field, can be found. The company is capitalized at \$1,000,000, and owns in fee-simple 35,000 acres of land bordering the Rio Grande, upon which the well is being drilled. Drilling on the deep test is now in progress, and, according to latest reports, the hole is something below 1000 feet in depth. A large California rig is on this well.

In the heavy crude fields of the coastal region all of the larger companies are preparing for an extensive drilling campaign due chiefly to the unprecedented high price of the product. The Humble field, situated just north of Houston, has come to the front again by the bringing in there by the Texas Company of another well which has a daily flow of 2200 barrels. This company brought in a 5000-barrel well in the same field early in March. Both of these wells are situated in proved territory, but the pay sand was struck in them at a depth of approximately 3225 feet, which is much below that of the original producing sand. Deep drilling is now to be done throughout that field, and perhaps in other of the older coastal fields which were believed to have been almost exhausted. Several competitions will take place in the Hull field within the next two or three weeks, it is expected. The price of leases in that territory has increased to as high as \$15,000 an acre.

Only Three and a Half Months' Oil Supply Now Above Ground.

Statistics of the production of petroleum in January and February, 1920, in the States east of California, based on reports filed with the United States Geological Survey, show that production continued to increase during February, and the daily average of 1,130,759 barrels for the month was more than 34,000 barrels greater than the rate for January. The greatest increases in daily averages were in Oklahoma and Kansas. Wyoming, Kentucky, California and Pennsylvania also showed increased production, and small losses were reported for Texas, Louisiana and West Virginia.

In spite of increased production, the stocks held by pipe line and other marketing companies decreased by more than 1,500,000 barrels during February, thus continuing the steady withdrawal of stocks begun last September. On the last day of February stocks were within 4,000,000 barrels of those held on December 31, 1918, when stocks marked a low level not recorded since 1910. The supply above ground is now sufficient for only about 3.6 months at the present rate of consumption of domestic petroleum.

The imports of crude oil decreased more than one and a third million barrels below the record established in January, but were greater by more than a million barrels than the imports in February, 1919.

Oil Discovery in Jiminez District of Mexico.

Matamoros, Mexico, March 27—[Special.]—An oil discovery that is believed by practical operators in the industry to be of far-reaching importance has just been made by the Transcontinental Oil Co. in the Jiminez district, about 175 miles southwest of here, and approximately 150 miles northwest of the Tampico oil fields. It is stated by arrivals here from the scene of the new find that there is no doubt of the great importance of the discovery. The well is of the gusher type, and, according to reports, its flow is not less than 50,000 barrels a day. Geologists and other representatives of the Transcontinental Oil Co. have been ordered to the scene to make tests and attend to other matters connected with the bringing in of the well and the laying out of future development work upon the land that the company has

under lease there. The discovery has caused much excitement among the oil men and others in the Tampico fields and all of Northeastern Mexico, and there is a rush to the prospective new field. The Federal Government has ordered a large force of troops to the district for the purpose of enforcing the law in regard to leasing land and other phases of the oil industry, it is stated.

The location of the new well is a short distance south of the Soto la Marina River and not far from the 1,000,000-acre Rusias ranch, upon which liquid asphalt springs exist, and where more or less prospecting for oil has been carried on for the last several years. The well is situated only about 100 miles south of the shallow oil field which is being developed in Starr and Zapata counties, Texas, near the Rio Grande.

National Lands of Mexico Opened for Oil Exploit.

Tampico, Mexico, March 24—[Special.]—Under the decree issued a few days ago by President Venustiano Carranza, opening all national lands of Mexico for petroleum exploitation, the following preferential classes for the granting of concessions are named:

First—Those holding oil concessions in lands bordering Federal grounds opened for exploitation.

Second—Those holding lands bordering national grounds, but not having oil concessions for lands they now hold.

Third—Those holding oil concessions within two kilometers of national grounds.

Besides, the new decree enforces the right to get concessions for 10 years with renewal right under Federal executive department's consent.

All concessionaires must drill their wells within a fixed period of 10 years from date of concessions, and only one well for each two kilometers of land.

All concessionaires must pay 100 pesos, equivalent to \$50 American money, as yearly tax for each kilometer or fraction.

The Federal Government tax, according to the decree, will consist of 5 per cent for production on the first 5000 cubic meters of petroleum and 20 per cent for each 5000 cubic meters if produced daily. An overtax will be fixed at the point of production, the Government taking the share scheduled should the produce fail to get 50 per cent of the capacity of the wells.

The concessions will be granted to native and naturalized Mexicans and to Mexican companies organized under Mexican laws, exclusively.

An addition to this decree provides that all concessionaires will be subject to all existing petroleum laws and are unable to transfer concessions to foreign governments or companies, nor admit them as associates.

Another article of the decree provides for confiscation of concession, concessionaires' buildings, deposits, etc., in case they ask for protection from any foreign government or admit same as associate.

The preamble of the decree says that national lands have been thrown open because Mexico petroleum fields are criss-crossed by rivers, bodies of water and seas, all of which margins are property of the Government, because many petitions have been received due to the enormous development of the oil industry, which, if properly encouraged, will enrich the national treasury.

Water Supply from Artesian Wells.

Memphis, Tenn., March 20—[Special.]—The City Council of Luxora, Ark., has let a contract for sinking a 1400-foot artesian well. Practically every city in the lower Mississippi Valley, including Memphis, gets a city water supply from artesian wells. The wells at Indianola, Miss., flow with enough force that no artificial or power pressure is necessary in the town. The water is better than 99.5 per cent pure, and to it is attributed much of the great improvement in health in the so-called bottom region. Artesian water was discovered 20 years ago at Greenwood, Miss., and in recent years thousands of wells have been put down. Every farmer can have one or more wells in the delta country, supply all needs for water and frequently with sufficient pressure to operate an electric plant.

Definite Plan for Reforestation Adopted by Great Southern Lumber Co.

Bogalusa, La., March 20—[Special.]—At the annual meeting of the directors of the Great Southern Lumber Co. at Bogalusa in the middle of March the matter of a reforestation policy was brought to a head by General Manager Sullivan, who has long had the matter in mind. The occasion was especially appropriate because a new president and some other officers have lately been elected, these being at the same time heavy stockholders in the concern. A policy adopted now promises, therefore, to be consistently followed.

President A. C. Goodyear, like Mr. Sullivan, believes in the future of the paper industry at Bogalusa, and, realizing that an end will come in time to the stock of virgin timber which now furnishes raw material to both the paper and sawmill, believes it would be good business for the company to provide raw material for the future; also, he thinks that the present is none too early to begin with it. This policy, in fact, was settled on at the meeting.

The matter having been under consideration by the local officials for about three years, a good deal of information helping to define a program was already in hand, and President Goodyear brought to the conference considerable acquaintance with the Northern paper industry. Mr. Sullivan had also secured the attendance of Austin Cary, logging engineer in the United States Forest Service, who, about a year ago, in company with a member of the Bureau of Soils at Washington, made a rapid survey of conditions on the company's lands. A half-day's trip in the field which the company's officials took in company with Mr. Cary was very convincing. It was very clear that with good management a heavy crop of pulpwood could be raised on certain types of cut-over land of no value for agricultural purposes in 20 years' time. Acre production, in fact, is probably three times as great as in the spruce region of the Northeast and of Canada, where, due to greatly shrunken supplies of pulpwood, tree planting on a considerable scale is already being carried on.

Fire control, the first step necessary in the new program, is already on foot in Washington and St. Tammany parishes, the company's field men having been taken into the organization for that purpose managed by the State Conservation Commission. The next step contemplated is to select a man to take the lead in the work. Mr. Sullivan's first move in the matter will be to look around in his present force to find, if possible, a man already familiar with the region and attached to the concern to train up for the work.

Adoption of the plan outlined by Mr. Cary marks a definite step in the direction of a practical solution of the reforestation problem as it affects the important operations of the Great Southern Lumber Co.

Hardwood Lumber Production Curtailed by Heavy Rains.

Memphis, Tenn., April 3—[Special.]—Production of hardwood lumber will be curtailed, probably to serious extent, as a result of hard rains which have fallen this week over the Southern producing region, with the Mississippi River and all important tributaries already flooded.

Logging operations have been suspended in many localities, especially in Arkansas and Louisiana, where logging crews have been driven from the forests by backwater from many of the smaller streams. Lumber mills are shutting down in consequence.

It is feared by lumber manufacturers that logging cannot be resumed generally before May. Even if favorable weather should prevail for 30 days the hardwood mills probably cannot operate to capacity before June.

Stocks of hardwood lumber already are low, and with production slowing up daily on account of rains and high water, it is likely that many home builders will have difficulty in finding hardwood for floors and interior trim.

Fully five inches of rain has fallen over the hardwood producing region within the last week. The crest of the high water is due to reach Memphis on Monday or Tuesday with a stage of 40 to 41 feet. Although the water is lapping the levees, there is little strain upon them. No fear is entertained that the rich alluvial region will be overflowed.

Great

\$10,000,000 FLORIDA BUILDING PROJECT.
Plans for Hotel, Apartment-House, Bungalows and
Land Improvements at St. Augustine.

Possibly the largest land development and building enterprise ever projected for Florida is outlined in a dispatch from St. Augustine stating the principal features of a \$10,000,000 enterprise. This dispatch is as follows:

"Preliminary plans are rapidly being completed by the Fountain of Youth Hotel Co. for the erection of a magnificent hotel and cottage colony on tracts of land the company has acquired in the north portion of St. Augustine.

"The company, with a capital of \$10,000,000, has been acquiring property here for several months past, either by purchase or options, and in the meantime its architects have prepared plans for the buildings, while landscape architects have made elaborate preparations for the beautification of the grounds and water-front of the tracts acquired.

"F. L. Hall, financial representative, has just returned from New York and is busy superintending the establishing of office headquarters. He states that contracts have been signed with New York parties to expend on the hotel building, apartments, bungalows and grounds an amount which will approximate \$10,000,000.

"The hotel architects are Starrett & Van Vleck and King & Campbell, well-known architects of New York. The landscape architects are Vitale, Brinckerhoff & Geiffert, also of New York. G. T. Butler of St. Augustine is the local engineer in charge.

"According to reports, actual operations will commence in the near future, and if all of the plans as mapped out are successfully consummated, St. Augustine will be the scene of one of the biggest building and development operations in the State, and when completed will have one of the greatest hotel and colony enterprises in Florida."

\$20,000,000 Building Program for Dallas This Year.

Dallas, Tex., April 2.—[Special].—Prominent in Dallas' \$20,000,000 construction program for 1920 is the 24-story \$3,000,000 Magnolia Petroleum Co. building, which will be the largest office building south of Chicago, with the exception of the Railway Exchange Building at St. Louis. The Magnolia Building, which has been underway for four months, will add considerably to Dallas' reputation as the "skyscraper center of the Southwest," there now being located here or under construction 55 buildings six or more stories in height. The Magnolia is the ninth building within an area of two blocks that is 12 or more stories in height, the combined value of these structures being around \$15,000,000.

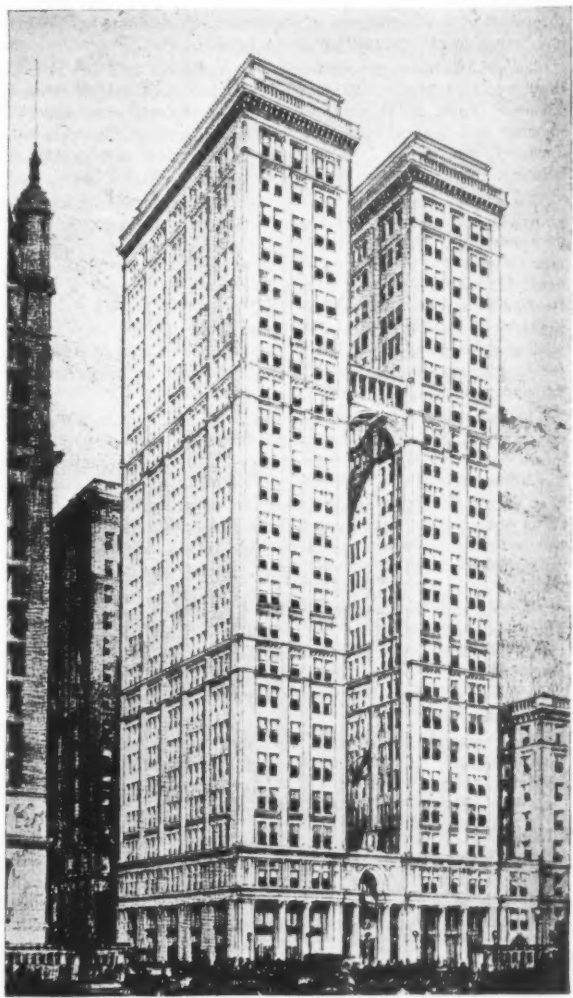
Dallas' building permits for 1919 were \$14,295,520, and at the present rate the permits for 1920 will total \$20,000,000. Dallas is an open-shop city, the Chamber of Commerce having formed an open-shop association last fall when \$8,000,000 worth of building construction was at a standstill because of labor troubles. Prominent among other buildings underway is the \$3,000,000 factory of the Procter & Gamble Company, the 12-story Dallas County State Bank Building, the \$1,500,000 Federal Reserve Bank Building, the \$800,000 Dallas Cotton Warehouse and two theaters, each costing more than \$500,000. There are more than 1000 buildings now under construction in Dallas. Dallas secured 500 new concerns in 1919. Many of these are having buildings erected, and a number of the long-established institutions are putting up additions to their quarters.

During the past three or four months the Dallas Open Shop Association has brought into Dallas and located, through its employment bureau, between 1200 and 1500 workmen, more than 1000 of whom represented skilled mechanics in the building trades. In spite of the general shortage of building labor throughout the country, therefore, Dallas has been placed in the enviable position of having at least its normal share of building laborers, particularly the "independent" mechanics.

A paint contractor recently reported that his weekly payroll for the same amount of work accomplished is much less than it was with union labor, even though he is paying the same or higher wages. One of the Dallas general contractors who is operating on the open-shop basis stated a few days ago that he is now "his own boss" for the first time in 20 years.

Unquestionably, the labor market in the building trades has been stabilized. For the past four months there have been no strikes of importance and no interruptions to the building program, thus making it possible to meet the unprecedented demand for houses and offices.

Dallas reflects the prosperity of this territory. It reflects the



24-STORY MAGNOLIA PETROLEUM BUILDING TO BE ERECTED IN DALLAS, TEXAS, AT A COST OF \$3,000,000.

fact that Texas led the nation in the value of agricultural products in 1919, Texas' total being in excess of \$1,000,000,000. Texas was second in livestock valuation in 1919. Two hundred and fifty oil companies are located in this city. It is estimated that oil development brought \$500,000,000 into Texas in 1919 and added \$2,500,000,000 to the State's land values during the same period. Dallas' bank clearings in 1919 were \$1,631,376,165, a 50 per cent gain over 1918. Dallas' jobbing business in 1919 was \$415,000,000, and its manufacturing output in excess of \$125,000,000. Coupled with these sources of revenue Dallas is the largest inland cotton market in the world, handling more than 1,500,000 bales in 1917.

Will Manufacture Metal Windows.

Capitalized at \$2,100,000, the Campbell Metal Window Corporation of Baltimore has been chartered for the manufacture of metal windows, and will be affiliated with the Bartlett Hayward Company. Howard Bruce, Addison C. Armstrong, George E. Probst and associates are directors of the new company.

Extensive Timber Properties to Be Developed as Result of \$1,000,000 Transaction.

Little Rock, Ark., April 1—[Special.]—The final details of the sale of the entire holding of the Bliss-Cook Oak Co. of Blissville to the Jerome Hardwood Co., which was announced several weeks ago, have been concluded, and the purchasing company is now in the midst of a big program of expansion. The name of the town has been changed from Blissville to Jerome.

The sale included properties in Drew, Chicot and Desha counties, involving about 8000 acres of timber land, 34,000 acres of cut-over lands, 2000 acres of plantations, railroads, sawmills, flooring mill, general store, cotton gin, the town of Blissville (now Jerome), and about 7,000,000 feet of manufactured lumber and flooring. The price was reported as well over \$1,000,000.

The Jerome Hardwood Lumber Co. was organized by men well known in the lumber business, its president, Otto Schupp, and its vice-president, William J. Wickes, both being residents of Saginaw, Mich. The secretary and treasurer, who is also general manager, H. F. Moeller, was also a Saginaw man formerly, but for the last two years has been manager of the Bliss-Cook Company's plant at Blissville. The other experienced lumbermen connected with the company are J. M. Wells, who will be in charge of the lumber department, and H. R. Black, who will be in charge of the flooring plant.

The greatest plans of the new company concern the building of the town of Jerome into a large and prosperous industrial community with every facility for the well-being of the employees and the upbuilding of the district. The plans include the installation of a bank, a refrigeration plant and a commissary, which will serve not only the employees of the company, but the settlers upon the company's cut-over lands as well. This rich territory comprises 34,000 acres, on which many settlers' homes will be established.

The company is planning the building of new homes for its employees, and it will allow for future growth of the plant in this respect. The officers say the commissary will be one of the best equipped in the South. As to the plant itself, it will be completely remodeled, a battery of drykilns installed, and considerable other equipment added.

The change of the name of the town from Blissville to Jerome has been taken up with the Postoffice Department, and will doubtless shortly be in effect.

The United States Chamber of Commerce has purchased the old home of Daniel Webster, in Washington, D. C., directly across Lafayette Square, facing the White House. The plan is to erect there a large structure as Washington office and as headquarters for out-of-town members of the organization.

Will Revive Question of Eliminating Panama Canal Tolls on American Coastwise Shipping.

Washington, D. C., April 6—[Special.]—Senator Jones of Washington, chairman of the Senate Committee on Commerce, has tacked onto a pending House bill an amendment providing for the free passage through the Panama Canal of American coastwise shipping. The issue involved is that which attracted national and international attention in the first few months of the first administration of President Wilson, when he forced Congress to repeal a previous act under which such free passage was given American vessels in the coast trade. It was stated at the time by the President that grave international complications, the nature of which he was precluded from revealing, rendered it imperative that his advice be followed.

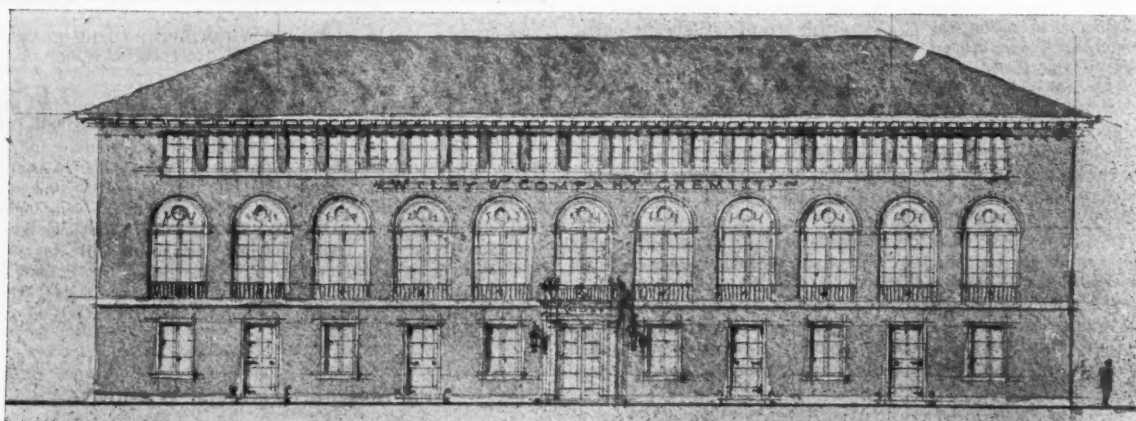
A few months ago sensational charges appeared in the daily press to the effect that Japan at the time was contemplating war on the United States; that she was endeavoring to arrange a large war loan in London, and that the international complications to which the President referred were this threat from Japan and the promise of England that in the event of favorable action on the tolls question she would prevent the Japanese attack. The charges, though widely printed, were neither denied nor substantiated. The State Department simply ignored them.

Evidence some time ago was presented to certain shipping interests in the Northwest which seemed to show that the British Government has been rebating Panama Canal tolls to certain classes of its own ships. Accordingly a concerted but quiet effort was made some weeks ago to interest Senators in reviving the old issue and restoring to American coastwise shipping the benefit of free passage, such as was undoubtedly contemplated when the nation decided to build the canal. The evidence presented was of such a character as to invite the support of a large body of legislators, and the amendment proposed by Senator Jones is the result. It will be warmly supported in both houses, and the chances of its passage by a majority vote are considered good. It is anticipated, however, that the President, in view of his stand seven years ago, will veto the bill if it comes before him. If so, the subject will be revived again next year.

For \$500,000 Rubber Tire Works at Memphis.

An investment of \$500,000 is proposed by the Dixie Rubber Co. as the first unit of a plan for manufacturing tires at Memphis, Tenn. This company has been organized with L. C. Cadenhead as manager, and its buildings will be of fireproof construction, costing \$250,000, to be equipped with machinery costing \$250,000 for a daily output of 500 automobile casings and inner tubes. Gaines & Carlisle are the architects for the buildings.

NEW CHEMICAL LABORATORY BUILDING FOR BALTIMORE.



New three-story structure to be erected by Samuel W. Wiley of Wiley & Company, Inc., analytical chemists of Baltimore, for use as a laboratory. Plans for the building call for a brick structure of unusually pleasing design. The two upper stories will be used for the laboratory and the main floor will be designed for use of either offices or stores. The building, which contemplates an expenditure of \$100,000 exclusive of the site, will be, according to Mr. Wiley, the most complete chemical laboratory in the country. The architect is William Gordon Beecher of Baltimore.

British Motor Manufacturers Black List Profiteers

RESUMING TRADE RELATIONS WITH GERMANY AND IMPORTING GERMAN GOODS.

[Special Correspondence Manufacturers Record.]

London, England, March 11.

The American Chamber of Commerce in London reports something new in motor car advertising in Great Britain, the departure being a quarter-page space in the Times and other leading newspapers announcing the plans of the manufacturer members of the Motor Trade Association for blacklisting profiteering middlemen.

In a well-laid-out advertisement, with the bold heading "To Stop Motor Profiteering," the Motor Trade Association says to the British public:

"The shortage of motors has brought about, as everybody is aware, a great deal of profiteering. Orders have been placed for cars by persons who did not require them. Taking advantage of the priority of delivery secured in this way, they have made money by selling these cars at a big premium. They have stepped in between the straightforward dealer and the genuine buyer, filching business from the former and money from the latter.

"Profiteering on motor cars is in principle the same as profiteering on food or any other commodity, and is contrary to the interest of the community.

"The manufacturers of the cars mentioned in the subjoined list are resolved to do everything in their power to thwart him. Steps have already been taken to check the trade profiteer; close attention will now be paid to the private profiteer.

"Strict inquiry will be made wherever there appears to be ground for suspicion. Cars will not be supplied to known premium-hunters. If you should chance to buy a car from one such, the fact will become known to the makers. Cars which have passed from one hand to another in this irregular way will be blacklisted.

"The manufacturers associated in making this announcement regard the matter so seriously that they reserve the right to withdraw from such cars any guarantee or after-sale service and attention that would otherwise be given.

"You are therefore earnestly warned to have nothing to do with cars offered for sale by profiteers."

The American Chamber in London points out that the Motor Trade Association is an association of firms and persons engaged in the manufacture or sale of motor cars and accessories, and is unique in that one of its objects is to protect the interests of users of motor goods as well as manufacturers, wholesalers and retailers. The Chamber notes with interest that of nearly 70 well-known motor cars represented in the list of signatories to the advertisement 16 are American.

German Trade With Britain Boomed by Leipzig Fair.

According to newspaper reports, about 100 British business men are among the large number of visitors to the Leipzig Fair, and large numbers of inquiries for German goods are arriving steadily by post and telegram from all parts of the British Empire.

The letters received by German traders are said to be of a very friendly character, and might be summed up in the remark contained in a letter from a Dublin man, who, in inquiring for representation of a German firm manufacturing iron fittings, says: "The interest of Europe requires that Germany as well as the Allies get to work again."

Among the orders and inquiries received by exhibiting German firms the following are said to be fairly typical:

A London engineering firm wants German machines of a special type for repairing damaged buildings in Belgium.

A Wolverhampton firm wants as many pianos as can possibly be supplied, and as quickly as possible.

A Birmingham man wants six pianos as a beginning.

The American Chamber understands that demands for optical glasses, instruments, dyes, colors, perfumes and essences are being received from all parts of Great Britain. India is also said to be furnishing both orders and inquiries. In accepting orders some German firms state that so-called French toilet and beauty prepa-

rations, now being largely sold in Great Britain, are of German manufacture, which have been exported to France and re-exported to England under Parisian names.

The replies from German manufacturers, while indicating cordial willingness to resume pre-war relations, are said to emphasize the fact that owing to shortage of raw materials, pressure of home demands and orders from countries contiguous to Germany, there is little prospect of British orders being executed within the next six months.

Meanwhile the American Chamber points out direct imports from Germany to England, although mostly small in quantity, are gradually extending, and cover a much wider range than a few weeks ago. Cargoes recently discharged at Grimsby, Liverpool and London include, among other goods, the following: Glass, toys, machinery, chemicals, sewing machines, flashlamp batteries, iron bolts, brass manufactures, bicycles, wire nails, drugs, aluminum and iron hollowware, wood pulp, gramophones, pianos, magnetos, motor lorries, furniture, clocks, cottons, rubber manufactures, paper, steelware, razors, cloth, hides and Ceresine wax.

Opportunity for American Agricultural Machinery.

Armenia should be a good market for American agricultural machinery and implements, as soon as stable conditions of government are assured in that country.

The American Chamber says that a recent meeting of the Council of the British-Armenian Chamber of Commerce, attended, amongst others, by H. E. Nubar Patha of the American National Delegation, and His Beatitude, the Patriarch of Constantinople, the former said that as soon as the Armenian State was set up by the Peace Conference one of its first cares and duties would be to establish commercial relations with the European countries, and they viewed with gratitude that Great Britain was taking the lead in that direction.

Their first efforts would be directed toward the restoration of their agriculture, in order to assure immediately the subsistence of the people on the produce of their country. As soon as that was accomplished they would be able to export their surplus.

To attain this double object, the American Chamber points out, they will need agricultural machinery and implements, which can only be obtained from abroad, and a vast field of activity is opened up in this respect.

Will Build 22 Subsidiary Factories.

Writing to the MANUFACTURERS RECORD in reference to plant enlargements at Fort Worth, Tex., the Simplex Ice Machine Co. states that it intends to establish 22 subsidiary plants. This corporation is capitalized at \$500,000, with general offices and temporary factory at Fort Worth, where it manufactures small ice and refrigerating machines. It writes the MANUFACTURERS RECORD:

"With factory we now have we cannot compete with the demand. It is our purpose to establish, throughout the Southern States, subsidiary plants sufficient in capacity to take care of the demand and open market that is beckoning to us. We have established a subsidiary in San Francisco having a capital of \$500,000, the parent company in Fort Worth owning 51 per cent of the stock. We are arranging to establish at least 22 subsidiary plants under the same principle."

Government to Investigate Increased Prices for Cotton Yarn.

Washington, D. C., April 6.—[Special.]—The House of Representatives has adopted the resolution directing the Federal Trade Commission to investigate the increased price of combed cotton yarn over the period 1914-1919, inclusive. It is understood that the inquiry will begin in the immediate future.

THE IRON AND STEEL SITUATION

Quiet in Pittsburgh District for Iron and Steel—Phenomenal Advance in Prices of Coke.

Pittsburgh, Pa., April 5—[Special.]—The only important development in the iron and steel markets, which in general have been very quiet in the past week, has been the phenomenal advance in Connellsville coke with the removal of the Government price restrictions. The President had announced beforehand, as noted in last report, that price restrictions would end entirely at the close of March, and this gave the market an opportunity to act before the end of the month, as transactions would involve coke to be shipped and invoiced April 1 and later. The Government price limits on Connellsville coke had been \$6 for furnace and \$7 for foundry, and it had been a common prediction for some time that whenever the restrictions were removed the market would advance to \$9 for furnace coke, or thereabouts, some observers doubting whether all of \$9 would be obtainable. The market did much better than that, for while the first transactions were at \$9 for furnace coke, the price prevailed for only a day or so, the market advancing sharply until for several days past furnace coke has been firm at \$11 to \$12, depending on tonnage and grade, while foundry has been firm at \$13 to \$14, and there is one isolated case of a carload selling at \$15.

This market activity does not mean, of course, that producers were holding their coke in order to sell at higher prices after the Government restrictions should come off. There has been some coke stocked, probably over 100,000 tons, for the whole Connellsville region, but that stocking was due to car shortage. The coke that was sold was coke released by the termination of first quarter contracts or by the ending of the understandings between certain producers and consumers, whereby for the period of Government control coke would be shipped and invoiced at the Government limit. The furnaces might possibly have been willing to contract for the remainder of the year, and doubtless would have preferred to contract for the second quarter, but when prices advanced to such remarkable levels they were willing to buy only for the month of April, and the great bulk of the trading has been simply for the single month.

In the trade one finds a wide variety of opinion as to the future of coke prices. Some in the trade argue that coal is going to be high-priced right along, say, above \$3.50, so that \$5 to \$6 should be set down as the cost of coal for making a ton of coke, and then a couple of dollars more for coking would mean \$7 or \$8, without any profit. Of course, there would have been a large profit in the coal, but there are different ways of figuring. In other quarters in the trade it is argued that the scarcity in coke will soon be over, since with the large amount of construction of by-product ovens in the past few years there is an excess of coking capacity over the needs of the blast furnaces. It is held that when coal can be obtained the by-product ovens will run, as they have profits in the by-products, and the beehive ovens will be used only to make up what deficiency is left. Coke is a peculiar commodity, in that when it is wanted it is very easy to secure a very high price, while when demand is even only slightly below supply one can scarcely give it away. This is due to the fact that 80 per cent of the coke goes to the blast furnaces, and blast furnaces do not count up the cost of coke before deciding whether or not to make pig-iron. They either want coke at whatever price is asked or they do not want it at all.

Outlook for Pig-Iron Prices.

The advance in coke has naturally stiffened the attitude of the merchant blast furnaces, and some have even talked of higher pig-iron prices, on the ground that the extra cost of coke should be passed on to the consumer. The consumer, on the other hand, now realizes that profits in pig-iron are very large, and is indisposed to commit himself farther, with pig-iron production already large and promising to increase. As for the steel works, which take a considerable portion of the merchant furnace output, though the iron foundries take the great bulk, they are simply unable to pay present asking prices for pig-iron, in view of the prices they are likely to have to accept for their steel for the

second half of the year. Some observers are so confident pig-iron is coming down that they are merely speculating as to the extent of the decline before there is another buying movement. The furnaces, however, are disposed to sit tight and await developments in their favor. They are so well sold up that they need have no concern at all for several months. The market is quotable at \$42 for Bessemer, \$41.50 for basic and \$42 for foundry iron f. o. b. valley furnaces, freight to Pittsburgh being \$1.40. Messrs. W. P. Snyder & Co. report average prices in March at \$42 for Bessemer and \$41.50 for basic, these averages being computed by taking all the sales of valley iron in lots of 1000 tons or over that are reported.

Readjustment in Steel Prices.

Steel prices are in process of readjustment. The fancy prices for prompt deliveries, representing premiums over forward deliveries, are marked to disappear, though the offerings at present are so extremely light that there is but little decline to be noticed. Prices at which the large independents sell seem likely also to come down. While these large independents sell for forward delivery they have been unwilling or unable to sell anything like as far ahead as the Steel Corporation, so that in a measure their higher prices are in the nature of involving a premium for delivery. The Steel Corporation, or Industrial Board prices of March 21, 1919, stand solidly. The Corporation will not advance them a dollar a ton, and, on the other hand, no one can think of looking forward to a time when they will decline.

The Steel Corporation policy of stabilizing the market is prevailing, though the whole matter has not worked out by any means, and the market may not present an even front for several months. The runaway in steel, predicted in some influential quarters, has failed. Superficially, the steel market failed to continue its runaway because production has proved larger in the past two or three months than was predicted by some of the producers, but the fault really lay with the predictions. Fundamentally, however, the runaway failed because steel is largely a construction material and investment builders will not pay fancy prices. They consider prices fancy when producers make unusual profits.

From another viewpoint it might be thought that the runaway in the steel market failed because business in general is disposed to be more cautious and because bankers have been preaching conservatism and against inflation. As a matter of fact, however, one can see that the steel market is playing through this very thing on a small scale, showing that it cannot go ahead on an inflated basis, any more than the entire business of the country can do so. The steel market has simply shown quick action, a ready response to economic laws.

Railroad Buying.

The volume of railroad buying continues to prove a disappointment, even to those who had very moderate views on the subject. It must be a keen disappointment to those who thought the railroads would be lavish buyers. Among those who made this error were a great many consumers of steel, who bought freely and at high prices not long ago because they wanted to get ahead of the railroads. Apart from the high prices that affect railroads in the matter of purchases, there is the difficulty of financing, some roads offering only 25 per cent cash when negotiating for freight cars, the balance to be in notes. To a limited extent some of the steel producers may accept railroad notes in turn from car builders, though the steel industry has had a habit of doing what amounts to a strictly cash business.

As for transportation conditions locally, the roads centering in Pittsburgh do not complain so much that they do not own enough cars as that they have not possession of their cars, so many having gotten scattered over the country. There is also the point of a great many cars being in process of repair, so that supplies will be larger later on. Railroad managers probably feel that the lines will be able to function moderately well in the not distant future. They are probably influenced also by the prospective adjustment of freight rates, being desirous of molding their plans as to expansions and improvements in accordance with the increase in rates they may secure.

Production.

There are still shortages of both coal and coke, due to insufficiency of car supplies at coal mines and coke works, but coal supplies at steel mills have improved since the ending of Government control. As the mills now have the privilege of bidding for coal, they have not hesitated to pay high prices, up to about \$4.50 a ton, against \$2.35 under Government control, these prices being for Pittsburgh district coal. The shortages are not entirely over. Production of both pig-iron and steel has increased further in the past fortnight, and is almost certain to increase still more. Instead of mills and furnaces functioning poorly, they are likely soon to be breaking their own production records. There has, indeed, been some of this already. The National Tube Co., which makes about 4 per cent of the country's finished steel, had a larger output in March than in any previous month in its history, and by a very considerable margin. All the product was shipped, moreover, as almost any variety of freight car can be used to ship one class of pipe or another. The car shortage has affected most largely the mills that require box cars, and box cars in good repair.

Activity at Furnaces in Birmingham District.

Birmingham, Ala., April 5.—[Special.]—Pig-iron selling was indulged in again to a little extent in this district recently, the leading interest booking business for about 25,000 tons, delivery during last half, and again at the \$38 per ton price, No. 2 foundry, 1.75 to 2.25 per cent silicon. The prices of pig-iron in this district range from the \$38 mentioned up to \$42 per ton. One or two companies are out of the market entirely, but will come back into the selling before long. Inquiries are quite numerous. A sale of a few hundred tons in the Philadelphia district was made the past week, while Chicago agencies placed several orders of medium tonnage. Inclination is still to be observed of holding the market steady, the \$40 per ton level generally prevailing.

Every indication points to a need for a large quantity of pig-iron during the last half of the year. Spot iron is rather scarce. Some export business is in sight, and transportation is the problem. Railroad car shortage has caused some delays in delivery of pig-iron from this district. There is little accumulation of the product. Production is about the same as it was two weeks ago. The preparations looking to an increased production of pig-iron are still on, and if the raw material supplies are steady, there will be two furnaces blown in this month, the Alabama and the Sloss-Sheffield Steel & Iron Co. each pushing work on a furnace.

Home consumption of pig-iron shows slight improvement. Iron-consuming industries are being constructed throughout the territory, and as quickly as they are completed are being placed in operation. Announcements of the past two weeks include another soil-pipe plant at Anniston and a new stove foundry at Gadsden. The Kilby Pipe & Foundry Co., subsidiary of the Kilby Frog & Switch Co., North Birmingham, is a late announcement, with a soil-pipe and fittings plant to cost upwards of \$50,000. The new plant will also make small castings for the frog and switch plant. The Birmingham Pipe & Fittings Co., Inc., will shortly have construction work in hand, to be followed by early operation. All these plants require pig-iron. It is not an unusual happening to see a train pulling into Anniston with several cars loaded with pig-iron. That progressive manufacturing town, 60 miles removed from Birmingham, has but one blast furnace, and it is necessary to purchase iron in Birmingham. Cast-iron pipe plants, foundries and machine shops, radiator plants and other works employing pig-iron in their daily operation in Birmingham and the immediate district are going at full speed practically, and must be kept in supply of iron. Where railroad transportation lags, motor trucks are used as a means of keeping a supply of iron.

Coal production in Alabama is around normal now, but there is no telling how soon conditions may change.

Elimination of collective bargaining, doing away with the union, in short, has been started on in this district, the coal operators taking the initiative. At a largely attended meeting a wage scale was worked out in which the 27 per cent advance in wages as compared to the scale in effect October 31, 1919, was given. The semi-monthly payday, the eight hours a day regulation and other regulations are continued. An industrial relations committee for every mine in the district is provided for, the mine-

workers at each place to elect three members of a committee from their number, and grievances will be presented to the superintendent first, then the general manager, and finally to the president. If then there is no settlement of contentions, an umpire, named by the Federal judge for the entire district, is to consider the grievance. The notice of advance was given to take effect April 1.

Officers and leaders of the United Mineworkers of America, who had received instructions from national officers to keep men at work pending the adoption of an agreement in the central competitive district, expressed consternation at the plan evolved by the operators, and at once predicted that it would not be acceptable to the rank and file of the men. The organized mine-workers are to hold a convention shortly, and a contract will be demanded. Refusal to grant the request may bring about some cessation of work. However, it is believed enough men will remain at work to care for sufficient fuel for furnaces, steel plants and the coke plants.

Coal prices have been advanced in the Alabama fields from 50 cents to \$1 per ton, at mines, to meet the advance in wages given labor. The increase has been passed by the retail dealer to the consumer, so that the public is paying the bills.

Coke making has not been disturbed any as yet, and there is belief that, whatever the union members may do, there will be no interference to any great extent with the output at ovens. Coke prices are advancing also. There is a steady inquiry for the product. Foundry coke advanced from \$9.75 to \$11 per ton.

Expectations now are that the Sloss-Sheffield Steel & Iron Co.'s by-product coke ovens at North Birmingham will be ready for operation within the next two weeks. The ovens are of the Semet-Solvay patent, 120 in. all, and will furnish enough coke to warrant the elimination of a number of beehive ovens of the company.

The scrap iron and steel market in the Birmingham district is rather quiet. Dealers say that consumers are playing the waiting game, while consumers assert that some of the quotations are too high, and that needs are being gotten in smaller lots at lower prices. The dealers are keeping stocks up to needs, and not laying in on a speculative basis. Deliveries are being made on old contracts, and consumers are not showing any anxiety to get quicker delivery of the product than stipulated in the contracts. The quotations show very little change in a week, readjustments being inconsequential. Heavy melting steel is still being held around \$24-25, while consumers say that \$20-21 is a fair price. Dealers in old material say they cannot understand how there is so much activity at blast furnaces, foundries and machine shops and at cast-iron pipe plants, with the old material market lagging. With pig-iron maintaining a basis of \$40 per ton, No. 2 foundry, the scrap dealers say that old material ought to come in for an inning.

Pig-iron and iron and steel scrap quotations in the Birmingham district are as follows:

PIG-IRON.

No. 2 foundry, 1.75 to 2.25 per cent silicon, f. o. b. furnaces, \$40 to \$42; No. 1 foundry, 2.25 to 2.75 per cent silicon, \$41.00 to \$43.00; iron of 2.75 to 3.25 per cent silicon, \$43.20 to \$45.20; basic, \$46; charcoal iron, \$55, f. o. b. furnace.

OLD MATERIAL.

Old steel axes.....	\$31.00 to \$32.00
Old iron axes.....	30.00 to 31.00
Old steel rails.....	24.00 to 25.00
Heavy melting steel.....	24.00 to 25.00
No. 1 R. R. wrought.....	23.00 to 24.00
No. 1 cast.....	30.00 to 31.00
Stove plate.....	29.00 to 30.00
Old car wheels.....	29.00 to 30.00
Old tramcar wheels.....	30.00 to 31.00
Machine-shop turnings.....	15.00 to 17.00
Cast-iron borings.....	15.00 to 16.00

Coal and Coke Production and Shipments.

Responding to the milder weather, the production of soft coal during the week ended March 27 increased 5.5 per cent. Preliminary estimates of the United States Geological Survey place the total output (including lignite and coal made into coke) at 10,914,000 net tons, an increase of 568,000 tons over the preceding week. The year 1920 is about 2,800,000 tons behind 1917, but is slightly ahead of 1918, and leads its immediate predecessor, 1919, by 26,450,000 tons.

Shipments of anthracite by the nine principal carriers—in part

estimated—amounted to 36,394 cars during the week of March 27. Allowing for mine fuel and sales to local trade, this indicates a total production of 1,869,000 net tons, an increase of 312,000 tons, or 20 per cent, over the preceding week.

The cumulative production of anthracite from the beginning of the coal year to March 27, 1920, amounted to 87,766,000 net tons. Production for the current year is about 4,500,000 tons short of that of the year 1918-19.

An increase of 7 per cent in the production of beehive coke during the week of March 27 is indicated by the shipments over the 26 principal coke-originating roads. The total output is estimated at 501,000 net tons, as compared with 467,000 tons during the preceding week. This was the largest tonnage reported in any week since February, 1919.

The cumulative production since the beginning of the year is now 5,494,000 tons. Compared with the corresponding period of 1919, this is a decrease of 392,000 tons, or 7 per cent.

Tidewater shipments continued in large volume during the month of February. The total quantity of bituminous coal dumped at North Atlantic ports was 2,899,000 net tons. Although smaller than the tonnage of January—3,185,000 tons—this was at nearly the same rate per day. Compared with February, 1919, the months showed an increase of 362,000 tons, or 14 per cent. In fact, the movement was the largest attained in any February during the last five years.

The total amount dumped during the first 11 months of the present coal year was 35,692,000 net tons. Compared with the preceding coal year (1918-1919), this was a decrease of 4,109,000 tons, or 10 per cent.

Coastwise shipments to New England during February were reported as 793,000 net tons, as compared with 804,000 tons in January. Although smaller in total quantity, the February movement was thus at a higher rate per day; in fact, at the highest rate since December, 1918.

The cumulative shipments to New England for the coal year, which began April 1, 1919, are far behind the record of the preceding coal year, 8,218,000 tons, as against 13,883,000 tons.

Overseas exports during February were 718,000 net tons, a decrease of 179,000 tons compared with January.

Exports fell off sharply at Philadelphia and Baltimore, and decreased at Hampton Roads. Exports from Charleston, however, rose from 29,000 to 64,000 tons.

Coke Production Decreased, But Capacity of By-Product Ovens Increased in 1919.

The outstanding features of the coke industry during the year 1919 were the great slump in demand that followed the armistice and a remarkable increase in the proportion of by-product coke made as compared with beehive coke. According to preliminary estimates made by F. G. Tryon of the United States Geological Survey, the total production of coke in 1919, including beehive and by-product, but excluding gashouse coke, was 44,821,000 net tons, a decrease, as compared with 1918, of 11,657,000 tons, or 20.6 per cent. The decrease was confined almost entirely to beehive coke, the production of which fell off 36 per cent. The output of by-product coke decreased only 3.2 per cent. The output of by-product coke consequently exceeded that of beehive coke for the first time. In 1918 about 46 per cent of the total coke made in the United States was produced in by-product ovens and 54 per cent in beehive ovens. In 1919 the proportions were reversed. 56 per cent coming from by-product and only 44 per cent from beehive ovens. The year 1919 thus marked a turning-point in the history of coke manufacture in the United States.

The quantity of coke manufactured in 1919 at illuminating-gas plants, not included in the figures given above, was about 3,200,000 tons. The total quantity of coke produced in 1919 was therefore about 48,000,000 tons.

These figures are preliminary only, and will be revised. Those for beehive coke are estimated from shipments by rail. Those for by-product coke are based on reports collected from producers in a preliminary canvass.

The blast furnaces are the great customers of the coke industry. In 1918, according to the statistical report of the American Iron and Steel Institute for 1918, they consumed 45,704,000 net

tons of coke, or 81 per cent of the total output of beehive and by-product coke combined. In 1919 the production of pig-iron fell off 22 per cent and the demand for coke declined in proportion. The reaction was especially felt by the producers of beehive coke.

The production of beehive coke fell off 10,831,000 tons, or 36 per cent, from 1918 to 1919. The total output in 1919 is estimated at 19,650,000 net tons. All districts shared in the decrease. The production in Pennsylvania and Ohio is placed at 14,861,000 tons, as compared with 22,276,000 tons the year before.

The total output of coke produced in by-product ovens in 1919 was 25,171,000 net tons, a decrease, as compared with 1918, of 827,000 tons, or 3.2 per cent. The effect of the decline in demand for by-product coke upon production was largely counteracted by the completion of new plants. The rate of production was higher during January, February and March than during the remainder of the year.

In 1919 a total of 1228 new by-product ovens were completed, of which 718 were new plants and 510 were extensions at existing plants. Pennsylvania put the largest number of new ovens in operation—478. Indiana came second, with 190, and Maryland third, with 180. One new State, Rhode Island, entered the ranks of by-product coke producers in January, when the Providence Gas Co.'s plant was completed.

Eight hundred and fifty-three ovens are scheduled to come into operation by July 1, 1920. Of these ovens, 247 are in Alabama, 220 in Pennsylvania, 210 in New York and smaller numbers in Illinois, West Virginia and Wisconsin. They are distributed among 11 projects, six of them new plants and five of them additions to existing plants.

The completion of these projects will mean an increase of 8 per cent in the total number of by-product ovens in the country. Construction is more active now than in the years immediately before 1914, when the European war began, but is less active than it was during the war. Much of the construction now under way was projected before the armistice. The number of by-product ovens under construction in recent years has been as follows:

BY-PRODUCT OVENS IN CONSTRUCTION, 1914-1920.

January 1, 1914.....	504	January 1, 1918.....	2,260
January 1, 1915.....	614	January 1, 1919.....	1,815
January 1, 1916.....	1,191	January 1, 1920.....	853
January 1, 1917.....	2,084		

The following table shows the number of ovens of each type in existence on January 1, 1920; the number on January 1, 1919, and the number now under construction. Of the ovens put in operation in 1919, 860 were of the Koppers type, 240 were Semet-Solvay and 128 were Wilputte:

OVENS IN USE AT BEGINNING AND END OF 1919, AND BUILDING JANUARY 1, 1920, BY TYPE.

	In existence January 1, 1919.	In existence January 1, 1920.	Building January 1, 1920.
Koppers.....	4,829	5,659	497
Semet-Solvay.....	2,035	2,275	180
United-Otto.....	1,840	1,754	26
Rohrbach.....	281	257	...
Wilputte.....	78	206	...
Cambria-Belgian.....	90	90	60
Gas Machinery.....	69	60	...
Klönne.....	42	42	...
Roberts.....	24	24	80
Piron.....	...	12	...
Totals.....	9,279	16,379	853

In the year 1918 there was thus an increase in the annual capacity of coke ovens amounting to 6,700,000 tons, or 25 per cent. The increase during the year 1919 was somewhat smaller, 5,800,000 tons, or 17.2 per cent.

The annual capacity of the plants completed and in operation at the beginning of 1920, including ovens temporarily idle, was 39,500,000 net tons. This figure represents the output at full capacity—operation of 100 per cent. In actual practice an average operation above 90 per cent cannot be assumed for the country as a whole. Weekly reports received from the by-product plants during the war show that from December 28, 1917, to February 1, 1919, the highest percentage attained for the entire country was 92.2, the output reached in the week ended September 28, 1918. The average for the year 1918, when every effort was being made to speed up the recovery of by-products, was 86.9 per cent of maximum capacity. The average for 1919 appears to have been about 70 per cent.

NEWS AND VIEWS FROM OUR READERS

[Publication in this department of letters from our readers does not mean that we either approve or disapprove the views expressed. We believe in a full and frank discussion of the mighty questions of the hour, for only in this way can the truth be found. Therefore we often publish letters with which we do not agree.—Editor Manufacturers Record.]

Remarkable Results Claimed in the Separation and Recovery of Mineral Ores.

JOHN N. ADAMS, C.E. and E.M., Mining Geologist, Charleston, Bradley County, Tennessee.

I am devoting all my time to a dry concentrator which I have erected at Knoxville, and which bids fair to revolutionize our Southern mining operations, as with it, at one operation, I separate six kinds of minerals in mechanical combination for instance, zinc, galena, pyrites, chalcopryite, baryte and dolomite. Formerly each of these ores rendered the others practically valueless.

I recover 100 per cent of the coal from slate or fire-clay carrying only 15 per cent coal.

I separate the refuse of the Aluminum Company of America's electric furnaces and recover carbon, electrolyte and copper. For the Johnson City furnace I reduce the phosphorous in their Cranberry ores to 0.0043 per cent and raise the metallic iron content from 47 per cent to 69.5 per cent, etc.

This machine is the invention of Sutton, Steele & Steele of Dallas, Tex.

The Question of a Fair Profit to the Manufacturer.

F. L. FORSTER, President Rome Furniture Co., Rome, Ga.

I have read with some interest Mr. Albertson's panacea for the present increased cost of living, and while I cannot altogether agree with Mr. Albertson, I would like a more definite understanding as to what would constitute a fair profit to a manufacturer from the standpoint of the spirit of each to each or the "Golden Rule."

I feel that some logical article along this line would do much to get the business men to thinking. I feel sure than there are some manufacturers today getting a profit beyond everything that is reasonable and in violation of anything that touches the Golden Rule, and I believe the time is coming when we, as American citizens, must face this great question in the spirit of each to each, and do our utmost to solve the problems, bearing in mind always that business must be based on a profit that would enable those who engage in such business a just profit on their investment.

Is there a common ground on which the world can get together as pertains to a reasonable and sane profit on the capital investment or volume of business done? I heartily agree with you that 10 per cent on invested capital would not be very much of an incentive.

Railroads as Users of Motor Trucks.

C. B. STANLEY, Four-Wheel Drive Auto Co., Clintonville, Wis.

A recent issue of the MANUFACTURERS RECORD contained an article on the use of motor cars in railroad service.

The return of the railroads to private ownership means that each road will avail itself of every possible means of increasing its transportation efficiency, and I predict that the railroads of the country will eventually furnish one of the greatest markets for motor trucks. During the war the motor truck proved its value in giving relief to the overburdened railroads in a way that demonstrated that it could be used to transport goods speedily, safely and economically. For short hauls it was apparent that the truck was faster, safer and more economical, all of which added to the popularity of the "Ship by Truck" method and an increased demand for trucking service.

With the unusual demands over, however, and the return of the railroads to private ownership, it is to be expected that each road will be out getting all the business it can. They will look with jealous eye upon any attempt to divert the traffic of the country to new channels, with the consequent result that rather than see competitive trucking service increase and a disposition on the part of truck owners to enlarge this service, the railroads will them-

selves inaugurate fleets of motor trucks to facilitate their transportation.

The advantages of a motor-truck transportation system for short hauls to facilitate the work of the steam roads are numerous. Probably the most striking is their economical feature. There is no expense for the right of way, while the cost of upkeep is centered entirely in the truck. There is no uncertainty about the terminal charges and no necessity for warehouses. Combined with this the truck has the added advantage of being able to go in any direction without being forced to follow a definite line of rails.

The concerted action of Federal and State commissions to improve the nation's roads and highways is an added inducement that promises to increasingly popularize the "Ship by Truck" method of transportation.

The Origin of Petroleum Deposits.

CHAS. E. CHIDSEY, Pascagoula, Miss.

In the MANUFACTURERS RECORD for March 25, page 127, there is a letter from Austin, Tex., in which the correspondent gives Mr. C. W. McKinney's theory of the origin of petroleum deposits in the earth. The theory of Mr. McKinney is similar, though not identical, with the theory advanced many years ago by Alexander Van Humboldt, and which is summarized by Mendeleeff in his Chemistry (Vol. I, page 401).

"Much more probably," he says "its (petroleum) formation may be attributed to the action of water penetrating through the crevasses formed on the mountain slopes and reaching to the heart of the earth, to that kernel of heated metallic matter which must be accepted as existing in the interior of the earth, it may be supposed that naphtha was produced by the action of water penetrating through the crevices of the strata during the upheaval of mountain chains, because water with iron carbide should give iron oxide and hydrocarbons (that is, oil and gas).

Direct experiments (Cloe, Mendeleeff) proves that the so-called spiegeleisen (manganiferous iron, rich in chemical combine carbon), when treated with acids, gives liquid hydrocarbons which in composition, appearance and properties are completely identical with naphtha, and carbide of uranium forms them directly when acted on by water. (Moissan)." And in a note Mendeleeff adds: "The reaction of the iron and carbon would give carbide of iron, which would remain in an incandescent state inside the earth. And the action of water, especially salt water, on this carbide of iron can give naphtha, C_nH_{2n} . The following is the typical equation for this formation: $3 FeCn - 4nH_2O$ equals MF_2O_4 (magnetic oxide) — C_nH_{2n} ."

This theory of Humboldt and Mendeleeff explains, and it is the only theory that does explain, the presence of hot salt water in every oil well that has ever been brought in, and the formulae given is confirmatory of the theory of Mr. C. W. McKinney.

Humboldt and Mendeleeff are among the giants of physical science, yet for all of that "famous experts" have for years past unanimously agreed to ignore the conclusions and judgment of these great men, yet with all, they cannot keep them from coming into their own, for their theory was based upon sound scientific principles, and must be sooner or later recognized, for as Schoenhauer says, "the truth can abide its time, as it had a long life before it."

Would Purchase Factory for Tractor Manufacture.

C. BALDWIN, the Savage Harvester Co., 701 Railroad Building, Denver, Col.

We are at this time standardizing our harvester machine, and would be interested in purchasing a factory in the East suitable for manufacturing tractors and combined harvesters. Would be very glad if you will enter our subscription for the MANUFACTURERS RECORD and forward us bill.

RAILROADS

MANY NEW INDUSTRIES ON THIS ROAD.

Norfolk & Western Annual Report Displays Great Activity During 1919.

Establishment of 94 new industries on its line is reported by the Norfolk & Western Railway Co. for the year 1919, these including 8 manufactories of mineral, metal and other products, 27 manufactories of lumber products, 44 manufactories of farm implements and farm products and 15 coal mines. At the end of the year there were on the system 182 companies for producing coal or coke, and a total of 294 separate mines, of which 281 were in actual operation. Of a total of 10,106 coke ovens, 2029 were in blast, and of 17 iron furnaces with a total daily capacity of 3470 tons of pig-iron, 8, with a total daily capacity of 2195 tons, were in blast.

The annual report, which covers the calendar year, shows a considerable improvement in the Norfolk & Western's facilities, the improvements including laying 100-pound rails on about 96 miles more of track and the receipt of new equipment, including 21 freight locomotives, 4 all-steel baggage and mail cars, 312 wooden hopper cars, 19 steel underframe cabin cars, besides other rolling stock. The hopper cars, the cabin cars and one of the locomotives were built at the Roanoke shops of the company. The Railroad Administration allotted to the line 10 heavy mountain locomotives, 50 heavy Mallet locomotives and 800 steel underframe box cars of 50 tons capacity, the total maximum purchase price of this equipment being \$6,887,750. This equipment was in service during 1919, and payment for it has been arranged by an equipment trust agreement dated January 15, 1920. A number of other betterments were made, including new stations or enlargements of old stations, etc.; the building of roundhouses, and other operating facilities. Automatic signals were installed on 55 miles of track, and there are now 309 miles single track and about 553 miles of double track having automatic signals.

The gross railway operating revenues for the year were \$76,925,500.23, a decrease as compared with 1918 of \$5,078,435.22, or 6.19 per cent. The increase in operating expenses was \$2,441,987.84, or very nearly 4 per cent more than 1918. Net revenues from railway operations amounted to \$12,904,313.91, a decrease of \$7,520,424.06, or 36.82 per cent, and as compared with 1917, a decrease of \$11,844,424.79, or 47.86 per cent. The company's guaranteed income of \$20,711,875.16, however, being based on the agreement with the Government, was not affected by the reduced revenues, the net result being that \$13,594,087.49 was transferred to profit and loss, or \$1,290,747 less than for 1918.

As indicating the altered conditions at present from those existing prior to Federal control, comparisons between figures for 1919 and those for 1917 are interesting. The total operating revenues last year showed an increase of more than \$11,000,000, but the net revenue from railway operations showed a decrease of more than \$11,800,000. Expenditures for maintenance of way and structures showed a great increase; for instance, there was spent for this in 1917, \$6,176,000, while in 1919 the increase over this was more than \$4,400,000. Maintenance of equipment cost almost doubled, for in 1917 it was something over \$12,000,000, while 1919 showed an increase over that of more than \$11,000,000. Expenditures for traffic, which in 1917 were more than \$800,000, decreased over \$364,000. Transportation costs, which were over \$20,800,000 in 1917, increased more than \$7,500,000. Last year the ratio of expenses to total operating revenues was a little less than 83¼ per cent, whereas in 1917 it was less than 62¼ per cent, so that the increase of ratio was 28¾ per cent. The cost of labor in 1919 was more than \$35,000,000, an increase over 1917 of more than \$13,900,000. In 1919 the cost of material and miscellaneous charges was more than \$28,900,000, an increase as compared with 1917 of more than \$8,900,000, the total increase in these two items over 1917 being over \$22,800,000.

Under the agreement with the Government the company is assured for the six months from March 1 to September 1 of a net income not less than \$10,355,937.58.

The report also says that the physical condition of the property when returned was good, but tie and rail renewals were deficient

because of difficulty of obtaining materials. Equipment generally was in good condition, but the proportion of engines out of service was greater at the end of Federal control than at the beginning, owing principally to severe use during the war and the limited time for restoring conditions. Deficiencies in these respects are to be made good by the Government.

Railroad for Lumber Development.

Uvalde, Tex., April 3—[Special.]—Extensive cedar forests are to be opened to development and the product given a transportation outlet by the construction of a railroad from Uvalde to Camp Wood, about 30 miles. James F. Halpin and C. Endsley, representing a syndicate of Eastern men, have taken preliminary steps toward construction. All material for building this road, Mr. Halpin states, is available. An agreement has been reached with the property-owners along the route, and all that now remains to be done is the securing of certain rights of way and bonuses, which it is believed will be done by April 15. It is understood that considerable material and equipment has already been purchased.

"This railway, if built," said Mr. Halpin, "will traverse a large territory now badly in need of railway facilities. It will bring into the San Antonio trade territory a rich and fast developing region. The line as at present planned will open up some 30 miles in Uvalde county, which includes some of the richest portions of that region, and in addition will be the means of developing the greater portion of Real and much of Edwards county, both of which are practically undeveloped as yet because of lack of transportation facilities."

Mexican Railroads Getting Busy.

Monterey, Mexico, April 2—[Special.]—According to Col. Paulino Fontes, Director-General of the National Railways of Mexico, contracts have just been closed in the United States for \$1,500,000 worth of rolling stock. He says that an additional \$1,500,000 will be spent for cars and locomotives within the next few weeks. New locomotives are already beginning to arrive, and these, together with those which are being repaired and rebuilt in company shops, will help relieve the shortage. Negotiations are in progress to re-establish through Pullman service between the United States and the City of Mexico, and it is stated that blockhouses are to be built along the main line all the way from the Rio Grande at Laredo to Mexico City. These small forts will be about 10 miles apart, and each have a garrison of Federal soldiers. A blockhouse system has been in operation for some time on the InterOceanic and the Mexican (Vera Cruz) railroads between Mexico City and Vera Cruz.

New Equipment.

St. Louis Southwestern Railway has ordered 20 instead of 10 locomotives for heavy freight service, and 10 of them will be delivered from Baldwin's about June 1.

Santa Fe System has ordered 50 locomotives from the Baldwin Locomotive Works, as follows: 10 Santa Fe type, 10 mountain type and 30 Mikado type.

Louisiana & Arkansas Railway, which has ordered 2 more 10-wheel locomotives from the Baldwin Works, is also reported in the market for 3 steel passenger cars.

Baltimore & Ohio Railroad is reported in the market for 2500 car bodies for box cars of 40 tons capacity; 600 hopper cars of 50 tons capacity, 50 40-ton refrigerator cars and 600 50-ton flat cars.

Burlington Route is reported about to purchase 500 gondola cars.

Georgia Railroad is reported in the market for 6 passenger cars.

Growing Business Demands Improvements.

A report from Fort Smith, Ark., says that the Fort Smith & Western Railway will be improved this year to take care of increased business. A petition was filed in the United States Court by A. L. Mills, receiver, asking for authority to spend \$225,000, of which \$125,000 is for ballasting, \$15,000 to widen embankments, \$50,000 for new sidetracks, \$20,000 for new equipment, and \$15,000 for buildings, etc.

Railroad Building in Oklahoma.

Ponca City, Okla., April 3—[Special.]—Numerous railway projects started prior to the war are being revived in Oklahoma, and in some instances actual construction is in progress. The Oklahoma Southwestern is being built from Bristow, a point in the south Cushing oil field, to Okmulgee, one of the principal oil cities, approximately 45 miles. Work is under way southeast from Bristow. The builders of the Oklahoma Southwestern are J. A. Frates, formerly general superintendent of the Frisco, and Tom Slick, an oil operator, who have already built three other roads in Oklahoma during the past five years. Slick is Frates' son-in-law. They built the Sapulpa & Oil Fields line from Depew to Shamrock, and the Oil Fields Short Line from Peckham to Dilworth, Okla., besides the Miami Mineral Belt Line from Quapaw, Okla., to Baxter Springs, Kans., through the Oklahoma-Kansas lead and zinc belt.

Since construction started on the Oklahoma Southwestern its State charter has been amended to permit an extension from Okmulgee southwest to the Red River, in Jefferson county, 250 miles, practically all the way through oil territory. The principal cities on the extension would be Okmulgee, Okemah, Shawnee, Tecumseh, Pauls Valley, Duncan, Waurika, Ryan and Terrall, the latter where the Rock Island Railroad crosses the Red River into Texas.

Another extension of the Slick-Frates road discussed, but not as yet provided in a charter, is northwest from Bristow via Oilton to Ponca City, all the way through oil territory. The people of Ponca City are also asking the extension of a Rock Island line, which now runs from Enid east to Billings, to Ponca City, 30 miles.

Another prior-to-the-war project which will now be completed is the Santa Fe extension southwest from Caney, Kans., to Pawhuska, Okla., approximately 40 miles, also through oil territory. Practically all this distance was graded, but no steel was laid. The charter calls for the extension of this line on west from Pawhuska to Fairfax, crossing practically all of Osage county east and west. It is claimed the line will shorten the distance between Kansas City and Gulf points considerably.

The Santa Fe is also undertaking the relaying of the entire track between Wichita and Kingman, Kans., at an expenditure of \$500,000. The new rails will be of the 85-pound-to-the-yard type.

The Chambers of Commerce of Oklahoma City, Waynoka and other towns along the proposed route have endorsed the proposition of a railroad northwest from Oklahoma City via Kingfisher, Fairview, Waynoka, Beaver, Guymon and Boise, all in Oklahoma, to the coal fields at Des Moines, N. M., a distance of 370 miles. This is another before-the-war project recently revived. It would open an entirely new agricultural region for practically the entire distance.

Another Northwestern Oklahoma line, now being considered, is one that will connect Buffalo, the county-seat of Harper county, and now without railroad facilities, with either the Missouri Pacific at Hartner, Kans., or the Santa Fe at Liberal, Kans.

Will Locate at Raleigh.

The Cumberland Railway & Power Co., which operates electric transmission lines and street-car systems at various places in North Carolina and Virginia, will, according to a report from Raleigh, remove its general offices to that city from Norfolk. They will be located in the Dortch Building as soon as it is completed. H. L. Jones of Norfolk is president; N. A. Sinclair of Fayetteville, N. C., vice-president, and George A. Peek of Norfolk, secretary-treasurer. J. I. Matthias is general manager, and Bennett Nooe of Clayton, N. C., general counsel.

Freight Facilities to Be Increased.

Improvements proposed at Fort Worth, Tex., by the St. Louis Southwestern Railway, according to a report from there, will demand the expenditure of about \$1,000,000, and will include, besides tracks to new industries, a new freight terminal at Hodge Station, and perhaps other buildings demanded for the increase of traffic. About 1,000,000 new ties are to be put in the track throughout the system.

Much Construction in Mexico.

Monterey, Mexico, April 2—[Special.]—Lumber, bridge timber, crossties and other material to rehabilitate the National Railways of Mexico have been pouring into the country by trainloads through Laredo and Eagle Pass during the last two weeks. Some shipments of crossties have been at the rate of 60 to 75 cars a day. All this material comes from East Texas mills. The rebuilding of long stretches of track on the different divisions leading out of Monterey is to be carried on as rapidly as necessary materials can be supplied, it is said. Scores of culverts and bridges will be rebuilt, some of them of considerable magnitude. New station buildings are also to be erected. Lumber is also being imported from the United States to build business houses and residences at Monterey, Saltillo, San Luis Potosi and others of the larger cities.

As a result of the extensive oil operations in the Tampico region, big quantities of lumber and other construction materials are being shipped into that territory by boat through the port of Tampico. Some of the larger oil companies are making improvements involving the expenditure of several million dollars each. At this time the Tampico region affords the biggest market in Mexico for American lumber and lumber products.

Provision Made for Completing Mobile Bay Channel.

Mobile, Ala., April 5—[Special.]—An additional \$60,000 needed by the United States Engineers' office at Mobile for completion of the work on the Mobile Bay channel has been provided by the Secretary of War, according to announcement of Major R. S. Thomas, engineer in charge. The money permits continued operation of three dredges. Major Thomas represented to the War Department that the appropriation was to meet an urgent need for the revived and increasing commerce of the port, statistics showing an increase in 1919 in foreign trade of nearly \$20,000,000 more than in 1918.

In 30 days vessels entering and leaving Mobile will use the straight channel now nearing completion. This new channel will be 1500 feet west of the old one, being 450 feet wide and 33 feet deep. The channel has been dredged to 32 feet on the new project, but because of the length of time necessary in dredging such a channel for a distance of 30 or more miles, shoaling places occur before a dredge can get back to its starting place. The projected depth of 30 feet with an average width of 220 feet, has been obtained in the bay channel for a distance of 17.7 miles. Mobile's ship channel is to be an average depth of 30 feet, mean low tide, and 33 feet over Mobile bar.

Automotive Show at Macon May 5-8.

Macon, Ga., April 3—[Special.]—The first big Southern automotive show will be held in this city May 5 to 8. A concrete and steel exposition building, costing \$125,000, and with 60,000 square feet of floor space, has been selected for the exhibition. There will be elaborate displays of automobiles, motortrucks, farm tractors and automotive accessories.

Macon staged the first national tractor show ever held in the South, and as a result 2000 tractors are now in use in this territory.

The May event is being staged by the Macon Automotive Dealers' Association, the Macon Chamber of Commerce, the Woman's Auxiliary of the Chamber of Commerce and the Bibb County Farm Bureau.

Building \$500,000 Florida Phosphate Terminal.

Construction is progressing at Fernandina, Fla., upon the \$500,000 phosphate terminal plant of the Florida Terminal Co., previously organized. Jack Camp is president, with main office at Ocala. The plant buildings will be of steel sheathed with corrugated galvanized iron, being on pilings, with foundations and tunnels of concrete. The crushing and drying plant will have hourly capacity of 60 tons, while the shiploading equipment will have an hourly capacity of 500 tons and the storage capacity is to be 25,000 tons. Charles E. Waddell of Asheville, N. C., is the consulting engineer, furnishing the plans and specifications, and with him is associated D. J. Dreyer, also of Asheville.

TEXTILE

Another North Carolina Cotton Mill.

Plans have been determined for the Ronda (N. C.) Cotton Mills, and \$230,000 will be invested for buildings with accompanying machinery. The mill structure will be of brick and concrete, 310 feet long by 84 feet wide, with 60x45-foot power-house and 64x45-foot warehouse, these structures costing \$50,000. Machinery to cost \$150,000 has been ordered, and this includes 7500 spindles, besides a \$30,000 electric and steam power plant generating 300 kilowatts for electric-power drive. G. M. Goodnight is the company's architect and engineer.

Eagle Yarn Mills Organized.

An installation of 10,000 spindles with accompanying machinery for spinning cotton yarn has been decided upon for the Eagle Yarn Mills, Belmont, N. C., organized by W. B. Puett and J. W. Stowe, who were recently mentioned as to organize another cotton-mill enterprise. This company is capitalized at \$800,000, and it has ordered its equipment of machinery. Mr. Puett is president, and Mr. Stowe is secretary-treasurer.

North State Mill Contracts Awarded.

Organization has been effected by the North State Cotton Mill Co., Taylorsville, N. C., mentioned recently as incorporated with \$500,000 capital. The company will erect a brick building costing \$75,000, and has awarded contract for this structure, the installation to include 5040 spindles with \$50,000 electric plant for electric-power drive. Machinery costing \$100,000 has been ordered.

For a 25,000-Spindle Equipment.

Combed yarn will be the product of the Priscilla Spinning Co., Raulo, N. C., organized recently with J. H. Mayes of Charlotte as president, treasurer, architect and engineer. This company will erect a three-story mill-construction building 313 feet long by 134 feet wide, and install 25,000 spindles to be driven by electric power, all this machinery having been purchased.

Ordered \$170,000 Additional Machinery.

New Equipment costing \$170,000 has been ordered for additions to the machinery of the Gastonia (N. C.) Cotton Manufacturing Co. This corporation will build an addition and install 5200 spindles driven by electric power for a daily output of 2000 pounds of yarn. It was mentioned recently as increasing capital.

Textile Mill Notes.

Frank T. Parker, Columbia, S. C., will build \$12,000 oil-press cloth mill.

John Garrou, Valdese, N. C., and associates have chartered the Pauline Knitting Mills with \$125,000 capital.

Harvey Holleman and associates have chartered the Community Hosiery Mills, capital \$100,000, at Apex, N. C.

At Lincolnton, N. C., the Indian Creek Mills has been incorporated with \$250,000 capital by D. P. Rhodes and associates.

An additional mill of brick and concrete construction, 500 feet long by 103 feet wide, will be built by the Bladenboro (N. C.) Cotton Mills.

The Albany (Ala.) Textile Co. will build additional mill and install 200 looms for weaving silk. It has ordered the machinery and is having building plans prepared.

A one-and-two story 118x42-foot building for dyehouse and warehouse will be erected by the Dunn Woolen Co., Martinsburg, W. Va., C. E. Kent being the architect.

Improvements have been decided upon for the Mary Leila Cotton Mills, Greensboro, Ga., and a \$200,000 contract has been awarded to the W. Z. Williams Company of Macon.

William A. Long, general superintendent of the Holston Manufacturing Co., Lenoir City, Tenn., and associates will organize the Kitzmiller-Scott Corporation to build hosiery knitting mills in Tennessee, Kentucky and Virginia.

Shamrock Damask Mills, Landrum, S. C., will build an addition; concrete and brick; \$10,000; install 30 looms; purchased \$40,000 machinery; \$1000 electric plant; 30 horse-power; electric drive; daily capacity 1500 yards damask.

The Hoke Cotton Mills Co., Raeford, N. C., recently incorporated, has organized with John C. Rankin of Lowell, N. C., as president. This company succeeds the Raeford Manufacturing Co., with 10,500 spindles for manufacturing cotton yarns, which product will be changed to tire fabrics.

John A. Bidwell of Beverly, N. J., has awarded contracts for his cotton cloth mill at Chesapeake City, Md. The building will be two stories high and 86½x32 feet, of frame, costing \$15,000. H. H. Griffin of Chesapeake City being the contractor. Its machinery will include 20 horse-power crude-oil fuel steam power plant, costing \$4000, and 24 looms for weaving.

Commendations, Kicks and Comments

Business Facts and Worth-While Editorials.

J. B. HAMMOND, Hammond-Stebbins Mining Co., Attalla, Ala.—I am enclosing check for \$6.50, covering one year's subscription to your valuable paper.

Aside from the facts quoted along business lines, I consider your editorials more than worth the price.

A Piteous Cry From Bulgaria.

DR. M. E. TEMCOFF, Dermantzie, Loukovisko, Bulgaria, No. 10.—Your favor of December 24, as well as a copy of MANUFACTURERS RECORD of December 25, found me at this big village the other day. I am glad you find my article of some interest to you.

I desire herewith to thank you most kindly for forwarding me said copy. And to be candid, enjoyed its contents as man never did before. To subscribe for it, much as I would like to, is out of consideration—our money is so low down it takes 6 leva to make one dollar. While, to ask you to send it on to me on credit is unbusinesslike, and I won't do a thing like that, although I am "awfully" American-literature hungry to the point of inanition, I might add. God send help to such as me, as I see no way out for men to do it!

"Sold" Him an Idea.

W. B. TROY, Ford Motor Co., Automobile Manufacturers, Jacksonville, Fla.—Many insertions and assertions are made in newspapers that advertising pays, but I have seen few papers boldly claiming that that which goes into a newspaper as publicity news, and for which the newspapers get nothing in return, is just as much an advertisement as the paid space carrying as such.

And when one, who is neither a subscriber or advertiser, benefits from a news item, to say the least, he should be willing to support the source that brought to him a value. I bought last week's MANUFACTURERS RECORD, and after reading it asked myself the question if it was worth 20 cents to me, and not being satisfied with the answer I picked up the paper again, and found that I had not given the attention to the foreword—Growing—that I should have. And it was then that I realized that this number was worth \$6.50 to me, so I am enclosing you check for this amount with the request that you forward to my address above for one year.

This article sold me an idea, and why should not more papers be careful and sell ideas; then people would buy more papers and advertising space.

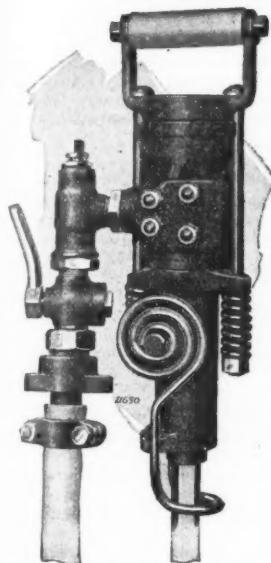
Wants Less Production, Less Strenuous Work and Less Old-Time Religion.

OTTO J. BOEHMER, Architect, St. Louis, Mo.—In reply to your question as to the reason for discontinuing my subscription to the MANUFACTURERS RECORD, allow me first to congratulate you on your utter detestation of the unspeakable Hun. Your Americanism is splendid, as that quality exists today, but to me it seems to lack some part of a true ring, owing possibly to lack of contact with all strata of people; in fact, it seems that selfishness in our isolation animates the same. Seemingly, you advocate more production and a more strenuous existence while I would prefer to have the latter removed as useless and tending to more and more of its kind. It is an easy matter to agree with you on the necessity of more religion, but not of the old-fashioned kind that has so long led people to church and long faces on Sundays and on Monday morning permitted them to arise before daybreak to crank up their machine to get out to see if perhaps their neighbor had allowed his business to lie around unprotected to be gathered up. The methods you advocate seems to me will load the "public" with an "overhead," which will be impossible to remove except by the "Russian" route. Give me more real living and less insane haste. We will all arrive at the end quite early enough.

P. S.—All of the above refers to your editorial policies.

MECHANICAL

A New Hand Hammer Drill.



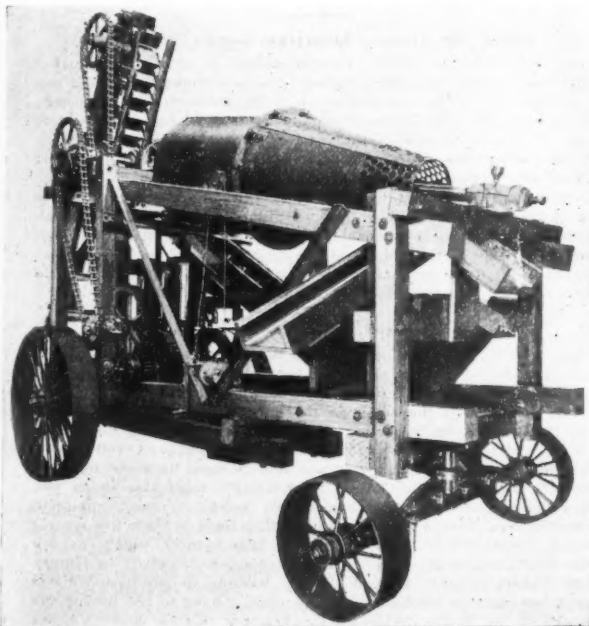
A LIGHT AND CONVENIENT DRILL.

machine of extreme light weight is necessary. Machines are now available varying in weights 21½, 35, 41 and 70 pounds.

Portable Gravel-Washing Plant.

A small portable gravel-washing machine has been developed, not to replace large permanent plants, but to fill a demand for a small machine which can be moved from bank to bank on road work and other contracts where permanent plants are not available and the gravel must be taken from small deposits.

The machine consists of an elevator, preliminary scrubber, screen and sand dewatering device, all mounted on heavy wheels



GRAVEL WASHER READY TO MOVE.

with broad tires. The elevator is made with heavy steel buckets mounted on single-strand chain. The elevator frame is so constructed that it can be folded up when the machine is to be moved. A small hand winch is provided to handle the elevator when it is to be folded or unfolded.

The scrubber and screen are of the well-known Dull patented type, consisting of a cylinder mounted on the same shaft as the screen and divided into compartments, besides having lifting vanes or paddles on the inner circumference of the shell. These are so arranged that the material is thoroughly agitated and washed before it enters the screen. The screen is arranged to divide the material into one grade of sand, one grade of gravel, and remove the oversize. The sand and water after passing through the screen drops into a settling tank. The dirty water overflows at the end of the tank, and the sand is dewatered by means of a heavy screw conveyor.

The plant is driven by a gasoline engine mounted on the same frame and connected by the necessary gears and drive chain.

The machine washes and screens material thoroughly and has a normal capacity of about 10 cubic yards per hour of pit-run material.

It is made by the Link-Belt Company of Philadelphia and Chicago.

Potash and Bromine in Texas Lakes.

Brines that contain potash and bromine have been discovered in alkali lakes in Gaines, Lynn and Terry counties, Texas, on the plain south of the Panhandle region. These lakes, which range in area from about 35 to 7000 acres, lie in flat valleys and have no surface outlets. During most of the year the beds of the lakes are dry and are covered with a thin crust of alkali salts, but occasionally they are flooded with a few inches of water. The sands that form the bottoms of the lakes are impregnated to a depth of 5 to 20 feet or more with brine that is composed essentially of the sulphates and chlorides of sodium, magnesium and potassium. Some of the brine contains also a relatively high percentage of bromine.

Private parties began exploring these lakes more than a year ago. They put down test holes in several lakes to depths ranging from about 5 to 30 feet and from them collected samples of the brines for analysis. The analytical results varied considerably with different samples, but indicated that the brines conform generally to the type mentioned.

A preliminary investigation of this region has just been made by the United States Geological Survey, in co-operation with the Bureau of Economic Geology and Technology of the University of Texas. Shallow holes were sunk in Cedar, Guthrie, Brownfield, Mound and Rich lakes, and samples of brine from the areas penetrated were collected and analyzed. These analyses confirm those made by the private analysts.

The data at hand is not sufficient to indicate the quantity of brine in the region. There is a difference of opinion as to the source of the brines. Some contend that they are of deep-seated origin; others contend that they are confined to a relatively thin stratum near the surface.

The feasibility of producing potash and bromine from these brines at a cost that will permit competition with potash and bromine produced from other sources depends on many factors, including the quantity of available brine in the region and the development of an economical process of extraction, and cannot be foretold. The location is unfavorable for obtaining fuel and labor, and is far from markets, and as the brines occur in muds that lie beneath the surface, their production in quantity would be expensive and difficult.

The salts of these brines contain a smaller percentage of potash (K_2O) than that yielded by the potash material of Germany, Alsace, Nebraska and Searles Lake, but, on the other hand, they contain a relatively high percentage of bromine, which is comparatively scarce and is now produced in this country principally from salt and calcium chloride brines in Michigan, Ohio and West Virginia. Much of the sodium sulphate of some of the brines of the region can probably be removed by refrigeration, which will leave in solution a product somewhat similar in composition to the German kainite. Such a probability indicates that a cheap process of obtaining the potash in marketable form might be devised.

FOREIGN NEEDS

[The MANUFACTURERS RECORD receives many letters from abroad asking for information about American goods, and others, from men who wish to represent American houses. Without assuming any responsibility for these concerns, we publish a summary of the foreign letters of inquiry from week to week.]

Perfumes, Soap, Textiles, Hardware, Etc.

RUSSO & TORREGROSSA, via Lungarini N. 13, Palermo, Italy.—Our principal articles that we dispose of are: Perfumery, soaps, woolen fabrics, textiles, linens, chocolates, hardware, jewelry, silks, etc. Dealing with firms in these lines, we will correspond in English.

Foodstuffs, Textiles, Waterproof Goods, Clothing.

MICHEL STYL, ANASTASSOPOULOS, Rue Ionos 9a, Athens, Greece.—This firm desires to represent reliable houses for food products, hides, woolen and cotton goods, wool and cotton coverings, waterproof goods, raincoats, canvas covering for automobiles and clothing. Correspondence in French suggested.

Artesian Well Machinery, Etc.

GENERAL MACHINERY & SUPPLY CO., S. A., Tampico, Mexico.—We are interested in artesian well machinery of all kinds, and we have also opened an electrical department, being agents for the Westinghouse Company. We are interested in all lines relative to this department. Correspondence in Spanish suggested.

Flour, Canned Goods, Textiles, Candy, Etc.

AP. ANTONIADIS, P. O. Box 494, Cairo, Egypt.—We request samples, particulars and prices c. i. f. Alexandria, on the following articles: Wheat flour in bags of 150 and 196 lbs. or at the manufacturers' convenience, tinned preserved fruits, tinned fish, textile goods, confectionery, woolen cloth for gentlemen's suits, chocolate, cocoa.

Cotton Goods, Chemicals, Dyes, Etc.

MEHTA & COMPANY, Amritsar (Punjab), India.—We are interested in the import of: Cotton and woolen piece goods and yarns, chemicals, glass beads, aniline dyes, and will be glad to hear from any of your reliable manufacturers with samples and prices. All prices to be c. i. f., c. i. Karachi Harbour, including commission.

Beads, Necklaces, Etc.

EDWIN H. HYDE, 58 Margaret Street, Sydney, N. S. W., Australia.—We are interested in all kinds of beads and bead necklaces, also we desire to get in touch with an efficient manufacturer who can make very small steel beads. Further, a business friend is interested in automatic machinery for the manufacture of snap fasteners. We shall be glad if you will put us into touch with builders of such machines.

Brick-Making Machines.

DR. ROGHELLA & CO., Via Remai No. 1, Flume, Hungary.—On account of the low exchange, we thought you might be able to interest exporters and importers in sending raw materials to Jugo-Slavia, Austria or Hungary, against a guarantee from a bank, and to receive instead of payment the manufactured products, which, on account of the low wages existing here, would make it very cheap. We beg you also to send us the names of manufacturers of machines for making braid. Correspondence in French suggested.

Dye Soaps, Paper, Foodstuffs.

M. PARRA & COMP., Oficinas y Almacenes: Neptuno 105, Habana, Cuba.—We are very much interested in securing dye soaps, but the kind we should like to obtain is the cheapest there is without any trade-mark or wrappers. We would also like very much to get in touch with manufacturers of perforated paper for toilet uses, good and cheap classes. We would like to represent, exclusively, any manufacturers of eatables, whether they be preserved in bottles or cans or salted or fresh. The market here for this line of goods is wonderful today. On account of the many tourists arriving here there seems to be quite a shortage in foodstuff.

Shoes, Hosiery, Clothing, Watches, Etc.

SIMON GEORGE, care of Messrs. E. O. Idowu Co., Kano, N. Nigeria, Africa.—Will you kindly put me in touch with a wholesale manufacturing shoehouse? I require about five dozen pairs dress shoes for gentlemen and ladies, various sizes, from size 4 to 10—Walk-Over preferred. Also put me in touch with a wholesale hosiery-house. I require about two dozen of good socks, various sizes; stocking, assorted several dozen shirts, garters, gentlemen's belts, neckties, pants, shoe polish, watches, a few pieces of white drills, khaki, underwears, clips, etc. I require some fancy yarns, Berlin wool, silk thread, cotton sewing thread for Singer sewing machine, Florida water and other perfumes, double-blade files for carpenters, etc.

Exports of Indian Products.

R. N. MEHRA & Co., Dinapore, Cantt. India.—As we have just formed an export office of our own to help the out-of-India merchants and manufacturers, we like to inform you that we want an agent in America to always search markets for the raw products of India.

Automobiles, Etc.

A. A. SHILNIKOF, Svetlanskaya No. 9, Vladivostok, Siberia.—I am especially interested in automobiles and automobile products. The outlook for selling American goods here is very good, because they exceed by far as in quality as in cheapness; the Japanese concurrence and the Russian industry is totally broken down after the nearly six-years' war and revolutions.

Trade Opportunities in India.

M. ACHAL CO., Summer Retreat, No. 16, Bombay, India.—During the four-years' war a good harvest of business was reaped by Japan in India, and as a matter of fact she had monopolized the trade here. The scales have now turned—every dealer desiring to order out his requirements of either British or American makes. The trade reputation has been lost by Japan, and now is the time for our American brethren to look sharp and force their goods on our markets. The only thing they have got to do is to quote on c. i. f. c and l. basis, in sterling as far as possible, and not in dollars, submit samples free of any costs and give nearest shipments.

Paper, Small Hardware, Etc.

AGENCE-GENERALE DE REPRESENTATION, Scicluna Sauveur, 3, Rue de Malte, Sfax (Tunis).—I would desire to get in contact with firms (reliable) dealing in printing paper, also carbon paper, wrapping paper, and, if possible, French sizes, in various shades and colors. I would also like to get in contact with manufacturers of small hardware, articles like made in Sheffield, England. I would like to get proposals from these firms. Prices must be in francs c. i. f. Tunis. There is a steamship line to and from Tunis each month. If successful in this, we will ask for quotations on agricultural implements. Correspondence in French suggested.

Colonial Goods, Textiles, Hardware, Etc.

ALLALOUF & MOCHE, Rue Verria No. 19, Salonika, Greece.—We are very much interested in American products, and are desirous of entering into business relations with some important American firms. We are successors to Moche & Uziel. We continue to occupy ourselves with commission, representation and consignment, and extend our operations in all the East; we have agencies in all the Balkan countries and also Athens-Pirae. A few of the articles we export are: Tobacco of Macedonia and Thrace, where we have offices at Cavalla, Evama, Xanthi and Guevguel; also opium of our country and of Macedonia Serbia, where we have our offices at Uskub, which are engaged in the purchase of that article. Our articles of import are principally colonial commodities, textiles, metal articles, etc. Correspondence in French suggested.

Hates the Huns—American Goods Wanted.

RAG. CAVAGNARO TULLIO R., Casella postale N. 438, Rome, Italy.—I find your review interesting for every business man; but I beg you to present my cordial compliments to your president, Mr. Edmonds, for his struggle against the "boches," because, I, too, am named in Italy a "damned German-hating fire eater," and I think the Huns will be always the enemies of liberty and of humanity. I have just formed two Italian partnerships in the import-export trade, for own account or acting as representatives in the following lines: Shoes and boots, shoemaking machinery, leathers, shoe finding, agricultural machinery and implements, coals and mineral oils, vessels of every type. Of course, we are ready to get in touch with any other American products manufacturers desiring to expand relations in Italy, which is a very good field for American goods.

Underwear, Hosiery, Sheetting.

POBLET & MUNDET S EN C., 146-148 Habana Street, P. O. Box 865, Havana, Cuba.—It would please us very much if in sending us any list of American manufacturers, you be kind enough to name only the Eastern States, inasmuch as they are much more prepared for exportation. We desire names of knitting mills, making men's bal-briggen underwear (light and medium-light weight), as well as cotton and mercerized hosiery for men and women, as these have an extensive demand in the Cuban market. We shall also thank you for a list of sheeting manufacturers, or, instead, of the commission houses at New York or Boston representing them. There are several sheet and pillow-case manufacturers in this country which can use great quantities of sheeting. A few days ago we received an inquiry from a sheet manufacturer in Havana wishing to purchase 200,000 yards, but we were unable to get this order, owing to not having the concern in the States that could manufacture this for him. A list of articles that the mills manufacture would facilitate matters greatly.

Construction Department

EXPLANATORY.

The MANUFACTURERS RECORD seeks to verify and obtain additional information regarding all enterprises reported in its Construction Department, by direct fact correspondence. Further facts of news value are published later from telegraph, mail and representatives' reports. We appreciate having our attention called to errors that may occur.

DAILY BULLETIN.

The Daily Bulletin of the MANUFACTURERS RECORD is published every business day in order to give the earliest possible news about new industrial, commercial, building, railroad and financial enterprises organized in the South and Southwest. It is invaluable to manufacturers, contractors, engineers and all others who want to get in touch at the earliest moment with new undertakings, or the enlargement of established enterprises. The subscription price is \$20.00 per year.

Bridges, Culverts and Viaducts.

Ky., Harlan.—Harlan County Comms.; construct bridges and roads; \$160,000 bonds; Nelson Cory, County Engr.

Miss., Meridian.—City, Mayor Dabney; construct concrete bridges; vote May 4 on \$90,000 bonds.

N. C., Nashville.—North Carolina State Highway Comsn. Div. Office, Raleigh, N. C.; construct 3 concrete bridges and 5 concrete culverts; 58,970 lbs. reinforced steel; bids until April 7; W. S. Fallis, Engr., Raleigh. (See Machinery Wanted—Bridge Construction.)

N. C., Wadesboro.—North Carolina State Highway Comsn., Raleigh, N. C.; construct 3 bridges on highway between Peachland and Union County line; \$17,772.90; J. Kries & Co., Contrs., Knoxville, Tenn.; John D. Waldrop, Highway Engr., Raleigh.

Tex., Round Rock.—Williamson County Commissioners, F. D. Love, Judge, Georgetown, Tex.; construct bridge across Brushy Creek; 70-ft. steel truss span; concrete floor; three 22-ft. concrete slab spans on each approach; concrete piers and abutments; 33,000 lbs. structural steel; 33,500 lbs. reinforcing steel; bids until Apr. 13; R. A. Nichols, Highway Engr. (See Machinery Wanted—Bridge Construction.)

Tex., Woodville.—Tyler County Comms.; awarded bridge contracts: T. O. Johnson, bridge over Badger Run and culvert on Sistersville-Friendly road; \$6287; Geo. F. Watson, bridge on Point Pleasant Creek; \$14,000; rejected bids for road work.

W. Va., Gay.—Logan County Comms., Don Chafin, Clerk, Logan, W. Va.; construct bridge over Trace Fork of Island Creek; roads; bids until April 19. (See Machinery Wanted—Bridge Construction.)

Canning and Packing Plants.

La., New Iberia.—New Iberia Canning Co. organized; Fritz Dietlein, Prest.; Arnold E. Frick, Secy.-Treas.; erect \$50,000 plant; can okra, cane syrup and spinach. (Lately noted inceptd., capital \$30,000.)

Md., Cambridge.—Noah Webster; rebuild burned cannery; loss \$95,000.

Miss., Biloxi.—Rucks Yeager, Jr.; erect vegetable cannery; install mchy. (See Machinery Wanted—Canning Machinery.)

S. C., Ridgeville.—Rogerdale Farm, L. Manning Rogers; establish pickle and canning factory. (See Machinery Wanted—Canning Equipment.)

Tenn., Memphis.—Memphis Packing Corp., Jos. Newburger, Prest.; construct \$350,000 cold-storage plant; capacity 250 cars vegetables, fruits, etc.; construct \$400,000 stockyard; capacity 50 cars stock; 25-acre site;

build \$375,000 abattoir; reinforced concrete, daylight or half-glass plant; daily capacity 400 hogs and 35 cattle; expend \$1,000,000 for site, buildings, pens, engineering, etc.; increase capital from \$1,000,000 to \$2,000,000. (Supersedes previous item.)

Tex., Houston.—Texas Union Packing Co. organized; capital \$3,000,000; Jeff T. Gibbons, Prest. and Gen. Mgr.; Eli H. Doud, V.-P.; P. P. Chandler, Secy.-Treas.; erect 4-story and basement concrete and brick construction fireproof building; construct refrigeration and electric-power plants; install meat-canning department; vegetable oil refineries; \$100,000 ice plant, 10 tons daily; fertilizer, tankage and bone-meal dept.; mfre sausage. (Lately noted inceptd., capital \$1,500,000.)

Va., Roanoke.—Armour & Co., main office, Chicago; erect \$75,000 building, including storage.

Va., Staunton.—Apple Products Co. inceptd.; capital \$200,000; C. M. Ackerman, Prest., New York; Walter M. Jordan, Secy., Staunton; can vegetables; mfre. preserves, jellies, etc.

Clayworking Plants.

Ala., Huntsville.—Bricks.—Huntsville Brick Co.; increase monthly output to 1,000,000 bricks.

Ga., Macon.—Clay Products.—Porter Brick Co. inceptd.; capital \$100,000; C. C. Porter, A. H. Robinson, J. E. Hall.

Ky., Louisville.—Hollow Tile.—P. Bannon Pike Co., Martin J. Bannon, Prest., 9th and Magnolia Sts.; rebuild burned plant; loss \$50,000 to \$75,000.

Miss., Philadelphia.—Bricks, etc.—Lee White; establish plant; ordered \$15,000 brick and tile manufacturing mchy.

S. C., Gaffney.—Bricks.—V. I. Spurgeon & Co.; mfre. brick.

S. C., Pickens.—Bricks.—J. D. Holder, W. E. Findley; establish brick plant.

Tenn., Algood.—Bricks.—Algood Brick Co. of Putnam County inceptd.; capital \$6000; A. P. Pointer, J. T. and Fred L. Moore.

Va., Pennington Gap.—Bricks.—Young Men's Commercial Club organized; capital \$30,000; establish brick plant.

W. Va., Chester.—Pottery.—Davidson Porcelain Co.; erect 3-kiln plant; D. F. Nellis & Co., Contr., East Liverpool, Ohio.

Coal Mines and Coke Ovens.

Ky., Alpharetta.—Blackburn Coal Co. incorporated; capital \$50,000; John and Fred Blackburn, U. G. Musie.

Ky., Sergeant.—Acme By-Products Coal Co., Fleming, Ky.; erect coal tipple, 50 miners' houses.

Ky., Henderson.—Clark-McDonald Coal Co. inceptd.; capital \$30,000; Joseph E. and Robert L. Clark, J. W. McDonald.

Ky., Smalley.—Bucks Branch Coal Co.; increased capital to \$100,000.

Ky., Smalley.—McGuire Elkhorn Coal Co. inceptd.; capital \$25,000; H. C. and W. W. McGuire, C. C. Wright.

Md., Spruce Bridge.—Consolidated Coal Co., Fairmont, W. Va.; develop 12,000 acres coal land.

Mo., Moniteau County.—Millbrook Coal Co., Exchange Bank Bldg., Jefferson City, Mo., organized; A. L. McCawley, Jefferson City; W. P. Grishorn, Raymond A. Becker, both Kansas City, Mo.; leased coal land; develop on large scale.

Okla., McCurtain.—McCurtain Improvement Coal Co. inceptd.; capital \$5000; Clarence Greenwelt, William Schuster, John Wyers.

Okla., Tulsa.—Leavell Coal Co. inceptd.; \$330,000; John H. Leavell, Fred W. Insull, Horace H. Hagan.

Va., Richmond.—Richmond Collieries Co. inceptd.; capital \$500,000; William Job, Prest.; Lelia M. Johns, Secy.

W. Va., Cecil.—Sterling Coal Co.; rebuild burned power-house and tipple; loss \$50,000.

W. Va., Fairmont.—Forest Coal Co. organized; H. W. Showalter, Prest.-Mgr.; S. D. Brady, V.-P.; H. E. Engle, Secy.; A. P. Brady, Secy.; develop 500 acres; daily output 4 cars; mchy. bought; W. H. Ellis, Consult. Engr.

W. Va., Clarksburg.—Peacock Coal Co. (lately noted inceptd., capital \$150,000) organized; Olandus West, Prest.; Paul Robinson, Treas.; E. Bryan Templeman, Secy.; Carl L. Hornor, Gen. Mgr.; develop 110 acres; install \$25,000 to \$50,000 mchy.

W. Va., Fairmont.—C. B. Turner, Pittsburg, Pa.; acquired 1000 acres coal land.

W. Va., Morgantown.—Shamrock Fuel Co. inceptd.; capital \$125,000; James L. Reynolds, Robert L. Brock, both Morgantown; William W. Greene, Uniontown, W. Va.

W. Va., Norwood.—Peacock Coal Co., Clarksburg, W. Va., organized; Olandus West, Prest.; J. Hornor Davis, V.-P.; E. B. Templeman, Secy.; P. M. Robinson, Treas.; Carl Hornor, Gen. Mgr.; acquired 100 acres coal land; develop. (Lately noted inceptd.; capital \$150,000.)

W. Va., Newburg.—Late-Koozer Coal Co. incorporated; capital \$50,000; Gordon B. Late, Joseph Van Zandt, D. B. Koozer.

W. Va., Tunnelton.—Tunnelton Freeport Coal Co. inceptd.; capital \$75,000; J. S. Tunnelton, J. William Hunt, both Tunnelton; Jos. M. Brady, Cumberland, Md.

W. Va., Welch.—Vaucluse Coal Co. inceptd.; capital \$25,000; W. W. Hughes, T. F. Henritze, both Welch; R. R. Fairfax, Roanoke, Va.

W. Va., Welch.—Graham Coal Co. inceptd.; capital \$400,000; Graham Sale, J. Randolph Tucker, W. W. Hughes.

Concrete and Cement Plants.

Ky., Louisville.—Portland Cement.—Kosmos Portland Cement Co.; increased capital from \$1,000,000 to \$1,500,000.

S. C., Anderson.—Concrete Products.—

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

Southern Concrete Products Co., incptd.; capital \$10,000; R. H. Wright, J. C. Smith.

Va., Bristol.—Cement Products.—Watauga Cement Products Corp. chartered; capital \$5000; W. W. Smith, Prest., Elizabethton, Tenn.; W. Lewis Smith, Secy., Johnson City, Tenn.

Cotton Compresses and Gins.

Ala., Montgomery.—Atlantic Compress Co.; rebuild burned plant; loss \$100,000.

N. C., Franklin.—Bunn Ginning Co. incptd.; capital \$25,000; Robt. White, Mrs. O. L. Tant.

Tex., Houston.—C. R. Fridge, care J. C. Barr & Co., 26 Dooley Bldg.; install Moss ginning equipment. (See Machinery Wanted—Gins.)

Okla., Meeker.—O'Dell Gin Co. incptd.; capital \$25,000; R. P. and P. P. O'Dell; both Meeker; J. E. O'Dell, Shawnee, Okla.

Okla., Middleberg.—Middleberg Gin & Grain Co. organized; capital \$20,000; W. C. Miller, Prest.; H. J. Bazer, E. E. Berry; build gin.

S. C., Greenville.—Brushy Creek Gin Co. incptd.; H. D. Cely, W. C. Elrod, J. B. Richey.

Tex., Honea Path.—C. E. Harper; rebuild ginnery and cotton-oil mill.

Tex., Lockney.—Ben Whitfill & Sons; rebuild burned gin; loss \$40,000.

Tex., Palestine.—Palestine Gin Co. incptd.; capital \$50,000; S. R. McMeans, R. E. Montgomery, W. D. Welborn.

Tex., Stamford.—W. J. Rosamond; erect gin.

Tex., Stamford.—Stamford Cotton Oil Co.; will erect gin; reported.

Cottonseed-Oil Mills.

S. C., Greer.—Greer Fertilizer Co.; purchased \$75,000 oil mill; enlarge; install mch.

S. C., Honea Path.—C. E. Harper; rebuild burned cotton-oil mill and ginnery.

Drainage Systems.

Ark., Jonesboro.—Craighead County Commrs., John B. Hinson, Chrmn. Drainage Dist. No. 24; construct drainage system; voted \$110,000 bonds.

Ark., Lewisville.—Long Prairie Drainage Dist., Directors, C. N. Maryman, Chrmn., Bradley, Ark.; construct drainage channels and levees; \$275,000; drain 32,000 acres; C. S. Christian, Engr., 424 State National Bank Bldg., Texarkana, Ark.; McWilliams Co., Contr., Memphis, Tenn. (Bids lately noted.)

Ga., Covington.—West Bear Creek Commissioners, R. L. Middlebrooks, Promoter, Starrsville, Ga.; construct 9 mi. ditch; 135,000 cu. yds. excavation; bids until April 17; Will D. Alexander, Engr., Charlotte, N. C. (See Machinery Wanted—Drainage System.)

Ga., Maysville.—Chandler Creek Drainage Dist., Otis R. Reynolds, Chrmn.; construct 4 1/4 mi. ditch; 81,893 cu. yds. excavation; \$17,000; drain 300 acres; Thompson & Moseley, Contrs., Atlanta, Ga.; Will D. Alexander, Engr., Charlotte, N. C. (Bids lately noted.)

La., Opelousas.—Bellevue & Coulee Croche Drainage Dist., St. Landry Parish, Frank Dimmick, Chrmn., Shuteston, La.; construct drainage system; \$60,000; drain 18,500 acres; H. S. Clark, Contr.; W. B. and H. S. Roberts, Engrs.; both Lafayette, La. (Bids lately noted.)

Mo., St. Joseph.—Buchanan County; Supervisors Platte River Drainage Dist. No. 1, W. F. Dyer, Secy.; construct 3 canals; \$234,000; drain 9083 acres; Laud & Sampson, Contrs.; W. B. Hazen, Engr., 53 Commercial Bldg. (Bids lately noted.)

Tex., Dallas.—City of Dallas & Dallas County Improvement Dist. No. 10 organized;

Arthur A. Stiles, State Reclamation Engr., Austin, Tex.; reclaim 4000 acres land; straighten Trinity River channel; construct levees.

Electric Plants.

Ala., Vida.—Alabama Power Co., W. E. Mitchell, Asst. Gen. Mgr., Birmingham, Ala.; construct 44,000-volt 30-mi. transmission line Vida to Selma.

Ga., Adel.—Town; improve light plant; vote April 14 on \$12,000 bonds. Address The Mayor.

Ky., Ashland.—Boyd County Electric Co.; increase capital to \$220,000.

Mo., St. Louis.—St. Louis Union Electric Light & Power Co., H. Spohrer, Secy.-Treas.; issue \$2,500,000 bonds.

N. C., Gastonia.—City, S. G. Fry, Clk.; enlarge and construct electric-light, power and water systems; vote on \$285,000 bonds.

Okla., Laverne.—City, Claude H. Arbuthnot, Supt.-Engr.; construct 80x30-ft. brick power-house; \$13,000; 1/4 mi. transmission line. Lately noted. (See Machinery Wanted—Engines; Electrical Machinery.)

Okla., Mounds.—Mounds Fuel & Light Co. incptd.; capital \$10,000; Joseph and H. M. Walker, M. V. McAtee.

S. C., Mount Carmel.—Little River Light & Power Co. incptd.; capital \$20,000; L. L. Hester, Prest.-Treas.; Carrie M. Hester, Secy.

S. C., Union.—City; extend electric-light system; vote on \$30,000 bonds. Address The Mayor.

Tenn., Clarksville.—Clarksville Electric Co.; erect electric plant.

Tex., Clarendon.—Texas Gas & Electric Co.; overhaul and improve plant; install mch.

Tex., Corpus Christi.—Corpus Christi Rwy. & Light Co.; remodel 2 plants; cost \$5000; probably.

Tex., Liberty.—Liberty Light & Power Co. incptd.; capital \$15,000; A. J. Riviere, E. B. Pickett, Jr.

Tex., Newcastle.—Newcastle Light & Power Co. incptd.; capital \$50,000; W. Fred Nance, W. S. Husted, A. C. Bentley.

W. Va., Charleston.—Gauley Oil, Gas & Power Co. incptd.; capital \$200,000; Paul B. Grosceup, J. B. Chapman; both Charleston; Dyer McClung, Ansted, W. Va.

Fertilizer Factories.

Ga., Dawson.—Dawson Cotton Oil Co.; install fertilizer plant.

Md., Baltimore.—Commonwealth Bacteria & Fertilizer Co., 110 E. Lombard St., incptd.; capital \$100,000; Henry W. Williams, R. Guy Cochran, Geo. J. Schedel.

Va., Lynchburg.—Farmers' Seed & Supply Co., 1306 Main St.; rebuild burned plant; loss \$3000.

Flour, Feed and Meal Mills.

Ky., Owensboro.—Sugarine.—Sugarine Co. organized; capital \$300,000; A. D. MacLellan, Prest.-Mgr.; Walker Lyddane, Secy.-Treas.; succeeds American Milling Co.

La., Crowley.—O. Abshire, A. B. Dore; plans erection 600-bbl. rice mill; machinery ordered.

Mo., Kansas City.—Lysle Milling Co., Leavenworth, Kans.; build 3000-bbl. capacity flour mill.

Okla., Banner.—Banner Co-operative Elevator Assn. incptd.; capital \$50,000; B. O. Finley, H. H. Maxey; both Banner; J. L. Newland, El Reno, Okla.

Okla., Catoosa.—Farmers' Mill & Elevator Co. incptd.; capital \$15,000; J. C. Smith, Edw. Konklin, L. A. Zellner.

Okla., Oklahoma City.—Grain Dealers of Oklahoma City, care P. L. Jacobson, 517 Grain Exchange Bldg.; erect steel and reinforced concrete grain elevator; contemplated. (P. L. Jacobson, C. B. Cozart, lately noted to build.)

Okla., Oklahoma City.—Buffalo Farmers' Co-operative Elevator Co. incptd.; capital \$40,000; S. E. Eline, V. W. Brown, J. W. Appleton; all Buffalo, N. Y.

Okla., Tulsa.—Tulsa County Farmers' Co-operative Co.; increase capital from \$10,000 to \$200,000; erect 300-bbl. roller mill and grain elevators at central points in county.

Tex., Burnet.—Burnet Roller Mills incptd.; capital \$25,000; A. V. Flowers, J. R. Hodges, O. M. Fitzhugh.

Tex., Folettt.—Farmers' Grain & Supply Co. incptd.; capital \$10,000; A. H. Montgomery, S. F. Cross, O. A. Crump.

Foundry and Machine Plants.

Ala., Birmingham.—Iron and Brass.—Dixie Brass & Foundry Co., Arthur Steiner, Secy., 6th Ave. between 12th and 13th Sts.; erect \$50,000 machine shop; increased capital from \$15,000 to \$100,000.

Ala., Tuscaloosa.—Machinery.—Warrior Foundry & Machine Co. incptd.; capital \$15,000; Emmett O'Rourke.

Ark., Blytheville.—Machine Shop.—Chicago Mill & Lumber Co. and Blytheville, Leachville & Arkansas Southern R. R., N. B. Orr, Chief Engr.; erect machine shop; capacity sufficient to handle work of both companies.

Fla., Jacksonville.—Ice Machines.—Grant Quick Ice Machine Co. incptd.; capital \$200,000; W. C. Grant, Prest.; C. V. Royster, V.-P.; J. S. Grant, Secy.-Treas.

Fla., Lakeland.—Blacksmith Shop.—F. B. Yerrell; rebuild burned blacksmith shop; loss \$5000.

Ga., Atlanta.—Machine Shop.—Georgia School of Technology; erect 2-story and basement 4x 214-ft. addition to mechanical building; first floor, machine shop; second, wood shop; basement, storage-rooms; brick walls; steel sash; steel roof trusses; slate roof; wood floors; reinforced concrete slabs; extend present foundry 40 ft.; plans by Prof. F. P. Smith, charge Dept. of Architecture; W. H. George, Contr., Builders' Exchange. (Lately noted.)

Ga., Savannah.—Iron.—Chatham Iron & Metal Co. incptd.; capital \$10,000; Samuel Tenenbaum, Louis Schoenberg.

Ky., Louisville.—Iron.—Dow Wire & Iron Works; increased capital to \$500,000.

Mo., St. Louis.—Felling Machines.—St. Louis Felling Machine Co., C. L. Knowles, Prest., 3763 Forest Park Blvd.; erect 1-story 60x175-ft. addition; Wedemeyer & Nelson, Archts., Wainwright Bldg.; John Hill Construction Co., Contr., 915 Olive St.

Mo., St. Louis.—Iron.—Fulton Iron Works, H. J. Steinbreder, Prest., 1259 Delaware St.; erect foundry addition; Fruin & Colton Construction Co., Contr., Merchant-Laclede Bldg.

N. C., Cherryville.—Gray-Iron Castings.—Cherryville Foundry Works, C. C. Dellinger, Secy.-Treas. and Mgr.; erect 40x80-ft. ordinary construction buildings; day labor; install cupola; daily capacity 10 tons gray-iron castings. Lately noted. (See Machinery Wanted—Cupola.)

Okla., Helena.—Cotton Gin Machinery.—Long Staple Cotton Gin Mfg. Co. incptd.; capital \$50,000; R. M. Milam, Tom J. Petit, J. M. Faulkner.

S. C., Union.—Machinery.—General Repair & Machine Co. incptd.; capital \$3000; S. I. Wood, A. G. Osteen, W. M. Wishert.

Tenn., Chattanooga.—Implements.—Chattanooga Implement & Mfg. Co.; increase capital to \$300,000.

Tex., Beaumont.—Iron Work.—Beaumont Iron Works Co., L. J. Black, Prest.-Mgr.; erect 70x170-ft. foundry; 3-story 60x30-ft. pattern shop; reinforced concrete construction; Robert Cummings, Archt., Houston, Tex. (Lately noted to increase plant capacity.)

Tex., Fort Worth.—Ice Machinery.—Simplex Ice Machine Co., W. H. Rathbone, Secy., 207 E. Front St.; build \$100,000 plant addition; concrete, steel and brick; manufactures ice and refrigerating machines; arranging to establish 22 subsidiary plants throughout South; Van Slyke & Woodruff, Archts., Reynolds Bldg. (Lately noted to build addition.)

Tex., Port Neches.—Hydraulic Machinery.—Hydraulic Machinery Mfg. Co. organized; capital \$250,000; C. F. Holmes, Prest.; A. H. Dewar, Secy.; R. C. Cogburn, Treas.

Tex., Ranger.—Foundry.—Wright Bros. Boiler & Machine Co. inceptd.; capital \$75,000; I. C. Rudman, C. A. and S. E. Wright.

Va., Danville.—Elevators.—Westbrook Elevator Co., 410 Spring St.; rebuild burned plant; 2-story; brick; fireproof construction; \$30,000. (Supersedes recent item.)

Va., Richmond.—Machinery.—Strickland Machine Co., Ed Whitlock, Prest.; increased capital from \$10,000 to \$50,000.

Va., Richmond.—Motor Axles.—Vulcan Motor Axle Corp. chartered; F. C. Gilbert, Prest.; Mack Ryan, Secy.; both Detroit, Mich.

Gas and Oil Enterprises.

Ga., Atlanta.—Texla Oil Co. inceptd.; capital \$1,000,000; J. L. DeGive, I. Lipstine, Andrew Carhorn.

Ga., Scotland.—Telfair Oil Co. organized; capital \$500,000; R. L. Kinchen, Prest., McRae, Ga.; E. H. Herman, Treas., Scotland; Warren Jeffries, Secy., Atlanta, Ga.

Ky., Louisville.—Sunset Petroleum Co. inceptd.; capital \$10,000; R. P. Dietzman, M. T. Moran, George A. Schuler.

Ky., Paintsville.—Victor Oil & Gas Co. inceptd.; capital \$50,000; C. T. Rule, F. S. and J. H. Cooper; lay 6 and 8-in. piping; drilling contract let; pumping mch. purchased; Jewel & Brown, Engrs. (See Machinery Wanted—Piping.)

Ky., Scottsville.—Essen Oil Co. inceptd.; capital \$150,000; Roy F. Mason, H. E. Marshall, H. J. Hurley.

Ky., Somerset.—Pulaski Oil & Development Co. inceptd.; capital \$50,000; J. R. Poynter; lay 3-mi. 3-in. piping; bids until Apr. 15. (See Machinery Wanted—Pipe.)

La., Alexandria.—Humble Oil Co.; rebuild burned plant; loss \$30,000.

La., Bogalusa.—Great Southern Lumber Co. expects to drill for oil on its cutover lands in future; W. H. Sullivan, Gen. Mgr., writes to Manufacturers Record: Not ready to announce plans. (Recent report of \$1,000,000 appropriation was an error.)

Md., Baltimore.—Standard Oil Co., Pratt and Commerce Sts.; erect five 1-story 20x20-ft. steel tanks; \$8634.

Md., Curtis Bay.—Prudential Oil Co., Keyser Bldg., Baltimore, Md.; construct 129x72-ft. factory addition; \$25,000.

N. C., Charlotte.—Gas Plants.—Southern Public Utilities Co., Z. V. Taylor, Prest.; improve gas plant; lay 8-mi. 4 to 10-in. pipe; bids until May 1; S. L. Duckett, Engr. (See Machinery Wanted—Pipe; Gas Plant.)

N. C., Newbern.—Flanner Oil Fields Co. inceptd.; capital \$100,000; Jno. Ivey Smith, A. F. Patterson, Chas. H. Hall.

Okla., Chickasha.—Refinery.—Lone Wolf Oil & Refining Co. organized; capital \$300,000; T. S. Hendrick, Prest.; J. J. Clark, Secy.-Treas.

Okla., Cushing.—Payne County Gas Co. inceptd.; capital \$50,000; P. T. and C. E. O'Herin, T. J. Hughes.

Okla., Duncan.—Mid-Union Drilling Co. inceptd.; capital \$25,000; Harry A. Baker, W. W. Payne, Roy C. Irick.

Okla., Nowata.—Sebastian Oil Products Co. inceptd.; capital \$75,000; J. E. Holliman, Alvin McNeal; both Nowata; F. W. Johnstone, Fort Smith, Ark.

Okla., Oklahoma City.—Walters Mining & Drilling Co. inceptd.; capital \$50,000; Earl C. Hickman, F. L. Hunzicker, H. C. Brice.

Okla., Oklahoma City.—Pace Oil Investment Co. inceptd.; capital \$25,000; O. R. B., Eva M. and Bessie M. Pace.

Okla., Pawhuska.—Oil Country Drilling Co. inceptd.; capital \$100,000; Chas. E. and Art L. Hess, both Pawhuska; Jno. L. Rupert, Pearonia, Okla.

Okla., Tulsa.—Mecan Petroleum Corp. chartered; capital \$300,000; Jno. H. Reisler, Nat. Wissman; both Tulsa; W. Friedman, New York.

Okla., Tulsa.—Hayes Drilling Co. inceptd.; capital \$25,000; T. A. and Mabel M. Simpson, Geo. R. Spinney.

Okla., Tulsa.—Simpson Oil Co. inceptd.; capital \$50,000; T. A. Simpson, Geo. A. Spinney, Chas. O'Connor.

Okla., Wagoner.—R & K Oil & Gas Co. inceptd.; capital \$10,000; Cal Shouse, Wagoner; N. B. Ketchersid, B. F. Spaulding, both Wichita, Kansas.

Tex., Fort Worth.—Mahlstet-Mook Oil Co. inceptd.; capital \$350,000; G. H. Mahlstet, R. H. Mook, W. B. Paddock.

Tex., Fort Worth.—Lubricants and Wax.—Transcontinental Oil Co., O. H. Berryman, Supt. Construction; erect \$750,000 lubricating and \$1,000,000 wax plant; 4 brick and concrete buildings.

Tex., Houston.—Texas Farm & Oil Land Corp. chartered; capital \$5000; E. A. Meyer, Glenn Nichols, J. A. Owen.

W. Va., Charleston.—Vickers Oil & Gas Co. inceptd.; capital \$30,000; M. F. Matheny, Charleston; C. C. Worrell, Mullens, W. Va.; A. F. Wysong, Princeton, W. Va.

W. Va., Charleston.—Ganley Oil, Gas & Power Co. inceptd.; capital \$200,000; Paul B. Grosscup, J. B. Chapman; both Charleston; Dyer McClung, Ansted, W. Va.

W. Va., Charleston.—Paramount Oil & Gas Co. inceptd.; capital \$250,000; T. W. Moore, O. V. Wilson, Oren R. Bush.

W. Va., Harpers Ferry.—Aeri-Farm Chemical Co. inceptd.; capital \$300,000; Hugh Lee Kirby, Geo. W. Griffin; both New York; Wm. Horner Campbell, Baltimore, Md.; petroleum and by-products.

W. Va., Hoult.—Hope Natural Gas Co.; reported to erect pumping station; secure gas from Domestic Coke Co.'s by-products plant; pump into mains.

W. Va., Spencer.—Big Sandy Oil & Gas Co. inceptd.; capital \$50,000; W. M. Lomey, Spencer; W. W. and R. K. Ogden, both Newton, W. Va.

Hydro-Electric Plants.

Tex., Gonzales.—Houston-Guadalupe Water Power Co., Ed Kennedy, Gen. Mgr., 613 Binz Bldg., Houston; build 1000 H. P. \$140,000 hydro-electric plant on Guadalupe River; construct 110-ft. dam; fall of water 8 ft., to be raised to 16 ft.; \$250,000 to \$300,000 transmission system to connect Guadalupe, Gonzales, San Antonio, etc.; 60 mi.;

construction bids in 60 days. (Previously noted.)

Va., Fallsburg.—Scottsville Power Corp. chartered; capital \$10,000; W. H. Langhorne, V.-P., Warren, Va.; John L. Pitts, Prest.; Lindsey Pitts, Secy.-Treas.; both Scottsville, Va.; build hydro-electric plant on James River; transmission system to connect Richmond, Lynchburg, Roanoke, Charlottesville, Staunton and Orange.

Ice and Cold-Storage Plants.

Fla., St. Petersburg.—Citizens' Ice & Cold Storage Co.; erect \$45,000 plant addition. (Lately noted increase capital to \$200,000.)

Ga., Greensboro.—Greensboro Ice Co. organized; E. J. Jones, Prest.-Mgr., Madison, Ga.; R. L. Caldwell, Secy.-Treas., Greensboro; erect ice plant; crude-oil fuel; daily capacity 10 tons.

Ky., Campbellsville.—E. Coppock, J. T. Collins; has plans; increase capacity; Henry Vogt Machine Co., Contr., Louisville, Ky. (Lately noted.)

Ky., Irvine.—Estill Ice Co.; erect ice plant; daily capacity 20 tons; Henry Vogt Machine Co., Contr., Louisville, Ky. (Lately noted to erect.)

Ky., Maysville.—Maysville Ice & Cold Storage Co. inceptd.; capital \$50,000; W. Hall and Margaret Strode, W. F. Gall.

Mo., Rollo.—G. E. Joslin; erect ice plant, creamery and ice-cream factory.

S. C., Camden.—R. W. Herfurth, Columbia, S. C.; establish ice plant; daily capacity 25 tons.

Tex., Beaumont.—Stedman Fruit Co., Ed Stedman, Prest.; re-establish burned plant; loss \$175,000.

Tex., El Paso.—Peyton Packing Co., J. C. Peyton, Prest.; build ice plant, cold-storage rooms and water tanks; \$100,000; erect 100x80-ft. brick building for ice plant, one 80x50-ft. for cold-storage and 30,000-gal. steel water tank; ordered mch.

Tex., El Paso.—El Paso Ice & Refrigerator Co., J. C. Peyton, Prest.; plans \$100,000 improvements; erect 3 additional stories on 2-story main building; install 600 H. P. boilers; ordered this first unit; later buy another unit; coal or oil fuel; retain present 600 to 700 H. P. boilers for emergency.

Land Developments.

N. C., Winston-Salem.—Highland Development Co. inceptd.; capital \$125,000; W. G. Jerome, W. Ray Johnson, D. H. Blair.

Tex., Houston.—Texas Farm & Oil Land Corp. chartered; capital \$5000; E. A. Meyer, Glenn Nichols, J. A. Owen.

Lumber Manufacturing.

Ala., Girard.—Butts Lumber Co.; rebuild burned plant; loss \$100,000.

Ala., Jackson.—T. T. McGowin, Kimbrough, Ala.; erect 40,000-ft.-capacity sawmill; veneer plant contemplated.

Ala., Phenix City.—Butts Lumber Co.; rebuild burned plant; loss \$100,000.

Ala., Tuscaloosa.—E. E. Canton, Memphis, Tenn.; establish hardwood plant.

Ark., Jerome.—Jerome Hardwood Co. organized; Otto Schupp, Prest.; Wm. J. Wickes, V.-P.; both Saginaw, Mich.; H. F. Moeller, Gen. Mgr.; purchased Bliss-Cook Oak Co.'s holdings, including 8300 acres timber, 24,000 acres cut-over land, 2000 acres of plantations, railroads, sawmills, flooring mill, cotton gin, town, 7,000,000 ft. manufactured lumber and flooring, etc.; plans thorough development; establish refrigerating plant, bank, com-

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

missary, etc.; build employes' homes; colonize 24,000 acres; remodel lumber plant and add new equipment; install battery of drykilns.

Fla., Okaloosa County.—Bagdad Lumber Co., W. B. Harbeson, Mgr., Bagdad, Fla.; ramored to erect large sawmill. (Previously noted improvements.)

Fla., Lakeland.—Lakeland Mfg. Co., G. W. Merzhon, Propr.; rebuild burned plant; loss \$35,000.

Fla., Rixford.—S. A. Hinely, C. E. Jones, Live Oak, Fla.; acquired 2100 acres; erect sawmill; develop for turpentine in connection with stock farm.

Fla., Vero.—St. Lucie Lumber & Supply Co.; erect saw, planing and lath mill and drykiln; daily capacity 5000 ft.

Ga., Liberty County.—Georgia Lumber Co., Savannah Trust Bldg., Savannah Ga., organized; capital \$50,000; John B. O'Neill, Prest., Treas. and Mgr.; R. N. Davis, V.-P.; A. L. Purvis, Secy.; has plant; daily capacity 25,000 ft.

Ky., Carr's Fork.—Red Oak Lumber Co., Winchester, Ky., organized; capital \$200,000; Wm. T. McLeomore, Prest.; R. D. Baker, Secy.-Treas.; construct mills; build narrow-gauge railway.

Ky., Lexington.—Blue Grass Lumber Co., Lee Congleton, Prest.; increased capital from \$10,000 to \$20,000.

N. C., Asheville.—W. F. Rogers Co. Inceptd.; capital \$3000; W. F. Rogers, Ben and O. M. Barnes.

N. C., Hendersonville.—Pace-Ficker Lumber Co. Inceptd.; capital \$50,000; D. S. and L. J. Pace, A. Ficker.

N. C., Lillington.—Chaffin Lumber Co. Incorporated; capital \$100,000; A. A. McDonald, L. M. and L. M. Chaffin.

S. C., Hardeeville.—Argent Lumber Co.; increase capital from \$100,000 to \$500,000.

W. Va., Harrisville.—Stout Lumber Co. Inceptd.; capital \$5000; W. S. Hunt, L. R. Snodgrass, J. H. Lininger.

S. C., Pineland.—Pineland Lumber Co. Inceptd.; capital \$50,000; J. I. Polk, Prest.; E. P. Carter, V.-P.; J. J. Finley, Secy.-Treas.; erect mill; acquired small mill; total daily capacity 30,000 ft. pine and hardwoods.

Tex., Houston.—Miller Lumber Co.; increased capital from \$30,000 to \$45,000.

Va., Bolar's Draft.—A. Rex Flinn, Pittsburgh, Pa.; develop timber tract; build standard-gauge railroad.

W. Va., Coal River.—D. E. Hewitt Lumber Co., Huntington, W. Va.; acquired 10,000 acres coal land; develop.

Metal-Working Plants.

Fla., Tampa.—Roofing, etc.—Eagle Roofing & Art Metal Works, Alex. Szabo, Mgr., 205 Cass St.; erect 1-story 123x143-ft. brick building; \$25,000; install electric-power press, brake and rollers; B. C. Bonfay, Archt.; McGurken & McGurken, Contrs.

Ky., Louisville.—Scales.—Stimpson Computing Scales Co.; increased capital to \$35,000.

Ky., Louisville.—Sheet Metal.—John H. Isert Co. Inceptd.; capital \$20,000; John H. and Mary L. Isert, Truman Cooke.

Md., Baltimore.—Metal Windows.—Campbell Metal Window Corp., Scott and McHenry Sts., chartered; capital \$2,100,000; Howard Bruce, director.

Md., Havre de Grace.—Crossties.—Maryland Metal Crosstie Co., A. Freeborn Brown, Prest.; advises Manufacturers Record: Plan under consideration for factories at different locations; mfr. steel crossties for railways.

Mo., St. Louis.—Enamel Ware.—Cruden-Mar-

tin Mfg. Co.; erect \$500,000 plant; 6-story reinforced concrete building; install automatic mchy.; mfr. galvanized and vitreous enamel ware; T. P. Barnett Co., Archt.

Mo., St. Louis.—Lightning Rods.—Miller Lightning Rod Co., L. E. Miller, Prest., 3d and Seyer Sts.; erect 1-story 50x33-ft. addition; H. O. Hirsch, Gen. Contr., Wainwright Bldg.

Okla., Tulsa.—Gravity Gauge.—Knight's Scientific Gravity Gauge Co. Inceptd.; capital \$25,000; R. E. Knight, A. W. Hales, Bailey E. Bell.

W. Va., Dunbar.—Aluminum Ware.—Fletcher Bros. Enamel Co.; erect plant; fireproof construction; steel and concrete walls; install mchy.; mfr. aluminum ware; increased capital from \$150,000 to \$450,000.

Mining.

Ga., Dalton.—Marble and Granite.—Hill Bros. Marble & Granite Co. Inceptd.; capital \$5000; John H. and Richard M. Hill.

Miss., Columbus.—Gravel.—Columbus Gravel Co., Box 132, Greenville, Miss., organized; C. C. Kershaw, Prest.; W. Brodnax, V.-P.; H. A. Porterfield, Secy.; G. H. Davant, Treas.; develop 300 acres; mchy. purchased; daily output 75 cars sand and gravel. (Latest noted Inceptd., capital \$150,000.)

Okla., Oklahoma City.—Walters Mining & Drilling Co. Inceptd.; capital \$50,000; Earl C. Hickman, F. L. Hunzicker, H. C. Brice.

Tenn., Columbus.—Phosphate.—Peerless Chemical Co. organized; E. T. Schuler, Gadsden, Ala.; double plant capacity; erect acid phosphate mill.

Tex., Corrigan.—Rock.—Lufkin Rock Co., L. Mitchell, Secy.-Treas., Lufkin, Tex., organized; capital \$50,000; has quarry and crusher.

Tex., Pecos.—Sulphur.—West Texas Sulphur Co., Alfred S. Wright, Prest., Crozer Bldg., Philadelphia, Pa.; plans thorough examination of sulphur deposits; view to installation of mchy. for mining.

Miscellaneous Construction.

Fla., Jacksonville.—Terminals, Wharves, etc.—City Comsn.; construct wharves, railroad terminal facilities, warehouses; \$2,000,000.

Ky., Lexington.—Swimming Pool.—Victor K. Dodge, Fred Bryant; construct open-air swimming pool, skating rink and garage; 84,000 sq. ft. site.

Tex., Bryan.—Levee.—Burleson County Levee Improvement Dist. No. 1; W. S. Mial, Chrmn. Board Supvrs., care of John K. Parker; construct 5000 ft. levee; bids until April 20; J. C. Nagle, Dist. Engr., College Station, Tex. (See Machinery Wanted—Levee Construction.)

Tex., Corpus Christi.—Breakwater.—City, Gordon Boone, Mayor; construct rubble mound breakwater in Corpus Christi Bay; placing 100,000 tons stone rip-rap; bids until April 15; R. J. Cummins, Const. Engr., City Engr. Previously noted to construct. (See Machinery Wanted—Breakwater.)

Miscellaneous Enterprises.

Ala., Birmingham.—Laundry.—Perfection Laundry Co.; erect brick and hollow tile building; E. Cline, Contr.

Ark., Texarkana.—Printing.—Firmin-Vaughan Printing Co. Inceptd.; capital \$10,000; Harry Firmin, Prest.; A. A. Vaughn, V.-P.; D. R. Vaughn, Secy.-Treas.

Fla., Lakeland.—Laundry.—Lakeland Steam Laundry, Reed Weaver, Propr.; rebuild burned plant; loss \$25,000.

Fla., Tampa.—Publishing.—Polyglot Publishing Co. Inceptd.; capital \$10,000; B. F. Forchardt, Prest.; A. R. Hernandez, Secy.

Ky., Crab Orchard.—Publishing.—Lincoln Publishing Co. Inceptd.; capital \$2500; George B. Lyne, J. T. Cherry, W. D. Edminton.

Ky., Louisville.—Publishing.—Pentecostal Publishing Co. Inceptd.; capital \$75,000; Henry C. Morrison, John H. Pritchard.

Ky., Louisville.—Railway Printers.—Gibbs-Inman Co.; increased capital from \$30,000 to \$360,000.

Md., Baltimore.—Foreign Trade Magazine.—Commerce and Maritime Record, 849 Equitable Bldg., organized capital \$50,000; H. P. Jones, Prest.; Albert Gorman, V.-P.; Edwin W. Poe, Secy.-Treas.; weekly foreign trade magazine.

Md., Baltimore.—Construction.—Calvert Construction Co., 2304 Ruskin Ave., Inceptd.; capital \$100,000; Louis M. and Harry Rubin, Joseph Joroslows.

Md., Baltimore.—Engineering.—Rust Engineering Co., Calvert Bldg., Inceptd.; E. Marshall Rust, Grattan Brittan, Jr., Frederic B. Warder.

Md., Bay Shore.—Amusement Park.—Sandy Beach Amusement Co., Robert F. Grigor, Gen. Mgr., Baltimore; construct Merry-Land Beach Amusement Park; 20-acre site.

Md., Cumberland.—Laundry.—Crystal Laundry Co.; erect 130x284-ft. building; brick, concrete and steel construction; \$200,000; build garage and separate power-house; install boilers, engines, laundry equipment; Thos. W. Biddle, Archt. (See Machinery Wanted—Boilers; Engines; Steel Sash; Laundry Equipment.)

Miss., Cleveland.—Laundry.—Cleveland Steam Laundry Inceptd.; capital \$10,000; P. B. Woolard, W. T. Winston; both Cleveland; J. N. Turner, Clarksdale, Miss.

Miss., Meridian.—Incinerator.—City, Mayor Dabney; construct incinerator plant; vote May 4 on \$15,000 bonds.

N. C., Oxford.—Paving Contracting.—Robert G. Lassiter & Co.; increased capital to \$50,000.

N. C., Raleigh.—Canal Transportation.—Lake Landing-Nebraska Canal Transportation Co. Inceptd.; capital \$50,000; J. E. Mann.

N. C., Tryon.—Publishing.—Polk County News; rebuild burned plant.

N. C., Wadesboro.—City, H. P. Taylor, Mayor; improve fire department; extend water and sewer systems; \$125,000 bonds.

Okla., Ponca City.—Plumbing.—Koller Plumbing Co. Inceptd.; capital \$25,000; Earl R. Ed E. and Gussie Koller.

Okla., Tulsa.—Laboratories.—Tulsa Laboratories Co. Inceptd., capital \$15,000; Harold R. Rowe, Walter A. Goldtrap, Roy L. Ginter.

S. C., Charleston.—Steamship Line.—Charleston Shipping Co. organized; capital \$100,000; Ashmead F. Pringle, Prest.; H. F. Barkerding, V.-P.; E. H. Pringle, Jr., Secy.; H. E. Quenstedt, Gen. Mgr.

Tex., Cisco.—Publishing.—Cisco Printing & Publishing Co.; increased capital from \$15,000 to \$30,000.

Tex., Dallas.—Printing.—Franklin Press Inceptd.; capital \$15,000; H. B. Sammons, D. L. Irwin, C. A. McCline.

Tex., El Paso.—Dairy.—Price's Dairy Co. Inceptd.; capital \$35,000; M. P. and H. B. Gage, Robert B. Price.

Tex., El Paso.—Paving.—El Paso Bituminous Co.; increased capital from \$100,000 to \$150,000.

Tex., Fort Worth.—Laundry.—Liberty Laundry Co., 100 S. Jennings Ave., organized; Curtis A. Hertig, Prest.-Mgr.; Walter H. Beck, V.-P.; M. D. Hansard, Secy.-Treas.; has build-

ing; install \$40,000 laundry mch.; B. F. Kauffman, Const. Engr., 515 Hemphill St. (Lately noted inceptd., capital \$50,000.)

Tex., Galveston—Publishing.—Press Publishing Co. inceptd.; capital \$4000; Clyde C. Stroger, Henry O'Dell, George P. Prendergast.

Tex., Lufkin—Cleaning and Dyeing.—Owl Cleaning & Dyeing Co., P. L. Owen, Prest.; erect \$15,000 plant; install mch. (See Machinery Wanted—Cleaning and Dyeing Equipment.)

Tex., Ranger—Construction.—Moore Construction Co. inceptd.; capital \$10,000; J. B. Moore, J. B. Moore, Jr., W. E. Umberson.

Va., Fairfax—Construction.—H. S. Hatton Construction Corp. chartered; Hannibal S. Hatton, Prest.; John S. Hatton, Secy.; both Washington, D. C.

Va., Richmond—Printing.—Brown Print Shop inceptd.; capital \$10,000; M. W. Brown, Prest.; R. E. Brown, Secy.

W. Va., Matoaka—Construction.—Burton-Davis Construction Co. inceptd.; capital \$5000; J. C. Burton, Matoaka; M. L. Davis, W. H. Malcolm, both Princeton, W. Va.

W. Va., Morgantown—Building and Construction.—Monongahela Building & Construction Co. inceptd.; capital \$150,000; Luther S. Brock, David H. Courtney, Aaron J. Garlow.

Miscellaneous Factories.

Ala., Mobile—Coffee.—Mobala Coffee Co.; increase capital from \$4000 to \$16,000.

Ala., Mobile—Batteries.—Service Battery Co. inceptd.; capital \$4000; Arthur E. and Jos. Abrams, Mary G. Klippel.

Fla., St. Augustine—Candy.—St. Augustine Confectionery Co., Thos. Filledes, Prop., 14 Cathedral St.; establish candy factory; purchased 2-story structure; remodel.

Fla., Tampa—Chera-Cola.—Chera-Cola Bottling Co. inceptd.; capital \$60,000; J. A. Keith, Prest., Treas. and Gen. Mgr.; G. L. White, Secy.

Fla., Tampa—Drugs.—Billim-Tawn Remedies Co. inceptd.; capital \$5000; E. R. Santos, Prest.; Chas. Naya, Secy.-Treas.

Fla., Tampa—Tobacco Products.—Davis-Dekle Cigar Co. inceptd.; capital \$50,000; Jas. G. Davis, Prest.; Louis G. De La Vergne, Secy.-Treas.

Ga., Five Forks—Cheese.—Five Forks Cheese Factory organized; W. C. Lipscomb, Prest., Cass Station, Ga.; W. D. Davidson, Secy.-Treas., Cartersville, Ga.

Ga., Tifton—Redrying Tobacco.—Spooner & Cawthen, Contrs.; erect redrying tobacco factory building.

Ga., Savannah—Stemmary.—Thos. E. Fearon, New York; establish tobacco stemmary.

Ky., Louisville—Paint, etc.—Kentucky Paint & Mineral Products Co. inceptd.; capital \$25,000; L. C. Bailey, Louisville; Jno. Goetz, O. G. Everbach; both New Albany, Ind.

Ky., Louisville—Small Grain Distilling Co. inceptd.; capital \$10,000; S. C. Miller, Wm. Veenmann, Sylvester Loew.

Ky., Louisville—Batteries.—Louisville Battery Service Co. inceptd.; capital \$60,000; Adolph F. Faure, Jesse R. Graves, Jno. J. Kirchner.

Md., Asbestos—Dry Felt.—Arthur E. Van Bibber, 6337 Drexel Bldg., Philadelphia, Pa.; purchased Baltimore Roofing & Asbestos Mfg. Co.'s plant, including 19-acre site; remodel to mfr. dry felt for floor coverings and roofing; install additional dryers, beaters; power-plant additions; probable daily capacity 40 tons dry felt; connected with Congoleum Co., Philadelphia. (Supersedes recent item.)

Md., Baltimore—Insoles.—Plural Insole Co., 704 Union Trust Bldg., inceptd.; capital \$25,000; Albert O. Moritz, Jacob Casper, Samuel J. Fisher.

Md., Baltimore—Chemicals.—Wiley & Co., Saml. W. Wiley, Prest., Treas. and Mgr., 7 S. Gay St.; erect 3-story 122x50-ft. fireproof laboratory building; \$110,000; has mch.; Wm. Gordon Beecher, Archt., Catonsville, Md. (Supersedes recent item.)

Md., Baltimore—Sugar Refinery.—American Sugar Refining Co., 117 Wall St., New York; let contract Stone & Webster Engineering Corp., 147 Milk St., to erect sugar refinery buildings; Chas. T. Main, Engr., 201 Devonshire St.; both Boston, Mass.; dimensions, character of construction, equipment capacity and cost have not been determined. (Previously noted as proposing \$8,000,000 investment for sugar refinery, including pier for 4 largest-size ocean vessels, warehouses, unloading machinery, industrial railway, etc., on 15-acre waterfront site.)

Md., Luke—Paper, etc.—West Virginia Pulp & Paper Co., 200 5th Ave.; erect plant addition; 120x100 and 90x50 ft. fireproof buildings; concrete and steel frame; install pulp mch.; Lockwood, Green & Co., Archts., 101 Park Ave.; Geo. R. Wadleigh, Constr. Engr., 200 5th Ave.; all New York. (Supersedes recent item.)

Md., Ridgely—Underwear.—Erlanger Underwear Mfg. Co., 527 W. Pratt St., Baltimore, Md.; erect 1-story 11x35-ft. factory building; Walter M. Gleske, Archt., Gunther Bldg., Baltimore, Md.

Mo., Rolla—Creamery.—G. E. Joslin; erect creamery, ice-cream and ice plants.

Mo., St. Louis—Medicine.—L. D. LeGear Medicine Co., L. D. LeGear, Prest., 1625 N. Broadway; erect 3 factory buildings; 6-story, 120x80; 3-story, 60x80; 8-story, 120x100 ft.; Leonard Haeger, Archt., 3844 Utah Place; Murch Bros. Construction Co., Gen. Contr., Railway Exchange Bldg.

Mo., St. Louis—Shoes.—McElroy-Sloan Shoe Co., J. P. Caddock, Prest., 1517 Washington Ave.; erect 5-story-and-basement 145x115-ft. factory building; A. B. Groves, Archt., 314 N. 14th St.; Murch Bros. Construction Co., Gen. Contr., Railway Exchange Bldg.

Mo., St. Louis—Drugs.—Merrill Drug Co., 3d and Market Sts.; erect 2-story factory building; Wm. Levy, Archt., 315 Market St.; Jas. Black Masonry & Contracting Co., Gen. Contr., Wright Bldg.

N. C., Greensboro—Overalls.—Blue Bell Overalls Co.; erect 2-story 235x60-ft. factory addition; \$75,000; B. P. Rose, Contr.

N. C., Greensboro—Cigars.—El-Rees-Sa Cigar Co.; increase capital from \$250,000 to \$500,000.

N. C., Tryon—Paper Boxes.—Tryon Paper Box Co.; rebuild burned plant.

N. C., Winston-Salem—Overalls, etc.—T. L. McGowan, Box 599; establish plant to mfr. overalls; later work trousers. (See Machinery Wanted—Overall Machines, etc.)

Okla., Tulsa—Batteries.—Oklahoma Battery & Supply Co. inceptd.; capital \$20,000; E. C. Wallace, Georgia Powell, B. V. Harper, all Sapulpa, Okla.

S. C., Columbia—Candy.—Averill Candy Co., 1424 Calhoun St., organized; F. S. Averill, Prest.-Mgr.; J. M. Averill, V.-P. and Treas.; F. E. Averill, Secy.; establish plant to mfr. lollipops; initial daily capacity 300 boxes; mfr. peanut and coconut candy. (Lately noted inceptd., capital \$10,000.)

S. C., Florence—Stemmary.—Douglas Martin; erect 224x70-ft. stemmary; brick.

S. C., Greer—Bakery.—E. Guy Ballenger, C. D. Berry; establish bakery; oven and mch.

ordered; daily capacity 4000 loaves; install electric power for molder and mixer.

Tenn., Chattanooga—Beverages, etc.—Daily Food & Beverage Co. inceptd.; capital \$100,000; Wilbur F. Daily, Walter J. Turnbull, E. M. Counts.

Tenn., Memphis—Bottling.—Graple-Co. Bottling Co. inceptd.; capital \$50,000; R. R. Rochell, Chas. E. Tedder, J. R. Routt.

Tenn., Nashville—Health Food.—Dr. W. B. Pickard; establish plant to mfr. health food. (See Machinery Wanted—Drying Outfit.)

Tex., Dallas—Leather Goods, etc.—Dallas Art Novelty Co. organized; capital \$1,000,000; Chas. Hawley, Prest.; Chas. A. Burke, Secy.; Geo. E. Vickers, Treas. and Sales Mgr.; erect \$200,000 building; mfr. leather goods, advertising calendars, novelties.

Tex., Hodge—Wax Plant.—Transcontinental Oil Co., Houston, Tex.; erect \$750,000 to \$1,000,000 plant; wax plant proper, barreling and compounding house, each 1 story; filter-house and sweater building, each 2 stories; all concrete and brick; capacity for 6600-bbl. by-products refinery; install mch.; lubricating oils and paraffin waxes; O. H. Berryman, Archt.-Engr.; Pratt-Thompson Co., Contr., Kansas City, Mo.

Tex., Lufkin—Candy, etc.—W. D. Newsom; erect 2-story building; brick; \$65,000; bottling works and candy factory.

Va., Hopewell—Molded Insulation.—Hopewell Insulation & Mfg. Co., 555 Eastern Parkway, Brooklyn, N. Y., organized; capital \$700,000; S. S. Sonneborn, Prest.-Treas.; C. Branda, Secy.; L. Day, Treas.; install hydraulic presses, machine-shop and rubber-mill equipment; mfr. molded insulation.

Va., Lynchburg—Bakeries.—Southern Barker Bakeries inceptd.; capital \$15,000; Stanyare Little, Prest., Johnson City, Tenn.; P. G. Morgan, Secy., Gaffney, S. C.

Va., Richmond—Cigars.—Ellett-Womble Cigar Co. inceptd.; capital \$25,000; Bartow P. Womble, Prest.; Jno. G. Womble, Secy.

W. Va., Charleston—Paper Pulp.—Nitro Pulp Mills inceptd.; capital \$1,000,000; W. D. Payne, C. P. Miller, Berkeley Minor. (Lately noted.)

W. Va., Parkersburg—Insulating Material.—Union Insulating Co., J. H. Parker, Prest.; erect 1-story 216x80-ft. factory building; Liberty Contracting Co., Contr., 103 Park Ave., New York. (Lately noted.)

W. Va., Parkersburg—Chlorine Products.—West Virginia Chlorine Corp. chartered; capitalization \$500,000; D. W. Stubblefield, Mgr., care First National Bank; build plant; first unit to cost \$150,000; daily capacity 7500 lbs. chlorine gas and 8300 lbs. caustic soda. (Supersedes recent item.)

Motor Cars, Garages, Tires, Etc.

Ala., Mobile—Automobiles.—McKerrall-Brisebois Motor Co. inceptd.; capital \$10,000; W. B. McKerrall.

Fla., Jacksonville—Tires.—Economic Tire Co. inceptd.; capital \$5000; Ralph Romydy, Prest.; Gordon McCauley, Secy.; Fred W. Lawser, Treas.

Fla., Miami—Garage.—Mechanics' Automobile Repair Co., Northside, Pittsburgh, Pa.; erect 50x175-ft. garage; fireproof; \$30,000.

Ga., Atlanta—Automobiles.—Parker-Holland Co., E. R. Parker, Mgr.; erect reinforced concrete fireproof building; 1 story in front and 3 stories in rear; dark brick; bronze or marble pillars; tile floors; Arthur Tufts, Archt.

Ky., Hopkinsville—Motors.—Cowhern-Foster Motor Co. inceptd.; capital \$30,000; S. L. Cowherd, L. B. Foster, Luther L. Cowherd.

Ky., Louisville—Garage.—Prince Wells Co.;

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

erect garage and salesroom on 74x200-ft. site; \$100,000.

Ky., Louisville—Motors.—Mattingly-Hubbard Motors Co. Inctd.; capital \$100,000; Geo. D. Mattingly, W. E. Mattingly, Stanley Hubbard.

Ky., West Point—Motors.—West Point Motor Co. Inctd.; capital \$20,000; C. E. Gray, A. C. Gray, J. W. Little.

La., Monroe—Garage.—F. C. Endom; erect garage; Gehr Construction Co., Contr.

Md., Baltimore—Motors.—Bandiere-Manuel Motor Co., 225 S. Highland Ave., Inctd.; capital \$100,000; Chas. M. Bandiere, Jos. R. Manuel, Wm. J. Bandiere.

Md., Baltimore—Automobiles.—Floyd-Rydstrom Co., 201 N. Charles St., Inctd.; capital \$100,000; Wm. C. Floyd, Herbert W. Rydstrom, Clay E. Dulauney.

Md., Baltimore—Garage.—Spann Motor Co., C. A. Spann, Prest.-Mgr., Philadelphia, East and Ellwood Aves.; erect 150x170-ft. garage; brick; fireproof; install lathe press, etc., for automobile work, \$4000; Robt. Milker, Archt., 350 E. 33d St. (See Machinery Wanted—Building Materials; Machine Tools; Electrical Equipment.)

Md., Baltimore—Automobiles.—Bandiere-Manuel Motor Co., 225 S. Highland Ave., organized; Jos. R. Manuel, Prest.; Chas. M. Bandiere, Secy.-Treas.; erect 1-story 30x115-ft. building adjoining 2-story 15x115-ft. building; \$30,000; has mchy. (Lately noted Inctd., capital \$100,000.)

Mo., Bethany—Garage.—Chas. Hacker & Son; erect 2-story-and-basement 82x100-ft. garage; Sutton & Son, Contrs.

Mo., Kansas City—Automobiles.—Smith Bros. Overland Co.; occupy 2-story 100x138-ft. building to be erected by D. H. Smith; Robert E. Peden, Archt.

Mo., Kansas City—Garage.—Louis Hax, 2627 Frederick Ave.; erect 1-story 31x51-ft. garage; C. H. Hellums, Contr., 718 Messanie Ave.

Mo., Kansas City—Automobiles.—Weaver Motor Co.; occupy 2-story-and-basement 100x100-ft. building to be erected by Scarritt Estate Co.

Mo., Kansas City—Tires.—World Puncture Proof Tire Co. organized; G. G. Brinton, Prest.; Dan Vance, V.-P.; C. C. Outhier, Secy.; W. R. Graham, Treas.; erect 2-story 50x117-ft. factory building; concrete; mfre. tires.

Mo., Kansas City—Tires.—Premier Tire & Rubber Co., Grover Joyce, Prest.; increased capital from \$300,000 to \$1,500,000; enlarge plant; remodel building; equip with machinery for making rubber products; erect building adjoining present factory building; floor space 20,000 sq. ft.

N. C., Charlotte—Garage.—J. Arthur Henderson; erect garage.

N. C., Charlotte—Service Station.—Matt D. Moore; erect service station; granite; \$10,000; contracts let.

N. C., Charlotte—Automobiles.—W. R. Strope Co. Inctd.; capital \$125,000; G. W. Harker, W. R. Stroupe, Clinton H. Stroupe.

N. C., Charlotte—Automobiles.—W. F. Dowd; erect 40x100-ft. building; steel; steel roof; concrete floor; \$12,000; lighting plant, \$300 to \$400.

N. C., Greensboro—Trucks.—Southern Truck & Car Corp., Garland Daniel, Secy.-Treas.; erect 60x112-ft. plant addition; galvanized iron; steel; glass; portable; fireproof; \$12,000; J. D. Wilkins, Contr.; plans 80x95-ft. building; steel; glass; equip for paint shop; 30x40-ft. blacksmith shop; total cost \$25,000.

S. C., Greenville—Tires.—Harris Accessory Co., 201 E. McBee Ave., Inctd.; capital \$100,

000; W. A. Harris, Prest.; Robert M. Varnon, Secy.-Treas.

S. C., Greenville—Garage.—Carpenter Bros.; erect \$500 garage.

S. C., Greenville—Garage.—Eugene F. Bates; erect 2-story and basement garage; brick; \$12,500.

N. C., Mebane—Motor Cars.—Elkins Motor Car Co. Inctd.; capital \$50,000; F. L. Elkins, W. B. Elkins, A. B. Elkins.

N. C., Mount Airy—Service Station.—Matt D. Moore; erect \$10,000 service station; granite; has let contract.

Okla., Muskogee—Filling Stations.—United Filling Station Co. Inctd.; capital \$100,000; A. O. Haberman, M. Powell, Sam S. Gill; erect 20 filling stations.

Okla., Oklahoma City—Automobile Parts.—Consolidated Automobile Parts Co. Inctd.; capital \$20,000; C. H. Lancaster, W. L. Davis, A. P. Gibson.

Tenn., Columbia—Garage.—E. P. Nickels; erect garage; steel roof.

Tenn., Memphis—Tubes, etc.—Dixie Rubber Co., 770 Randolph Bldg., organized; L. C. Cadenhead, V.-P. and Mgr., Memphis; E. V. Catoe, Prest., Webb, Miss.; T. J. Gresham, Secy.-Treas., Indianola, Miss.; erect first plant unit; fireproof; \$250,000; install \$250,000 machinery; daily output 500 automobile casings and inner tubes; will let building contract; Gaines & Carlisle, Archts. (Supercedes recent item.)

S. C., Columbia—Automobiles.—Davis Motor Co. Inctd.; capital \$25,000; Harold R. Mull; Clarence H. Mole.

S. C., Conway—Automobile Supplies.—Betha Automobile & Realty Co. Inctd.; capital \$1000; Power W. Betha, Prest.-Treas.; Hilda W. Betha, V.-P.-Secy.

S. C., Greenville—Automobiles.—Sam Zimmerman, J. S. Williams; erect 3-story 180x88-ft. display or show room; hollow tile; pressed brick; plate-glass fronts; gravel roof; tile and wood floor; \$125,000 to \$150,000; steam heat; electric-lighting plant; electric elevators; W. M. Jordan, Contr.; F. H. & J. G. Cunningham, Archts.

S. C., Sumter—Automobiles.—Tisdale Motor Co. Inctd.; capital \$20,000; A. E. Tisdale, Prest.; S. B. Dillard, V.-P.; C. S. Rice, Treas.

Tex., Alice—Motors.—Mac Word Motor Co. Inctd.; capital \$12,000; W. T. Wright, J. C. Blacknall, Mac Word.

Tex., Amarillo—Automobiles.—J. D. Ingram; construct reinforced concrete 3-story-and-basement 80x120-ft. building.

Tex., Dallas—Tires.—McLaren Tire Co. Inctd.; capital \$50,000; R. B. Sticher, R. E. L. Saner, C. D. Turner.

Tex., Donna—Motors.—Valley Motors Co. Inctd.; capital \$10,000; E. J. Jamerson, W. B. Brooks, C. V. Hamilton.

Tex., El Paso—Tires.—Federal Tire Co. Inctd.; capital \$20,000; G. H. Dietrich, A. J. Engquist, Alice Engquist.

Tex., Wichita Falls—Trucks.—Wichita Motors Co.; increase assembling plant from daily capacity 8 trucks to 24; contemplated. (Lately noted increasing capital from \$800,000 to \$1,800,000.)

Va., Bristol—Garage.—Frank I. Kilgore; erect garage.

W. Va., Morgantown—Motors.—Morgantown Motor Car Co. Inctd.; capital \$50,000; J. McDermott, Jno. R. Snyder, Frank Schmidiger.

W. Va., Shinnston—Automobiles.—Shinnston Ford Service Co. Inctd.; capital \$10,000; W. J. Currey, A. M. Hess, Charles Randall.

Railway Shops, Terminals, Roundhouses, Etc.

Tex., Big Springs.—Texas & Pacific R. R., E. F. Mitchell, Ch. Engr., Dallas, Tex.; rebuild machine-shop.

Road and Street Construction.

Ala., Anniston.—City; pave 7 mi. streets; \$345,616.84. Address The Mayor.

Ala., Jasper.—City, Steven Cranford, Clk.; construct 78,000 sq. yds. paving; 7500 sq. yds. alley paving; sheet asphalt, bitulithic, asphaltic concrete brick or Portland cement concrete; 9500 cu. yds. grading; bids until Apr. 16; Robert L. Totten, Conslt. Engr., Birmingham, Ala. (See Machinery Wanted—Paving.)

Ark., Little Rock.—Commrs. Little Rock-Pulaski Road Improvement Dist. No. 10, B. Bodeman, Secy.; construct 55 mi. streets and roads in Sections 1 and 2, including Crystal Hill, Conway and Alexander roads; asphaltic concrete or warrenite paving on rolled stone or concrete base; plain concrete paving; culverts and bridges; bids until April 26; Lund & Hill, Engrs., 527 Southern Trust Bldg. (See Machinery Wanted—Road Construction.)

Ark., Magnolia.—Columbia County Commrs., Magnolia-McNeil Road Improvement Dist. No. 1, W. R. Cross, Secy.; construct graded road with 12-ft. gravel surface; 21,200 cu. yds. gravel; 60,000 cu. yds. grading; \$140,000; W. P. Ritchie, Contr., Camden, Ark.; Parkes Engineering Co., Engr., Pine Bluff, Ark. (Lately noted inviting bids.)

Ark., Mountain View.—Stone County Commrs., Improvement Dist. No. 3; construct roads; sold \$50,000 bonds.

Ark., Searey.—White County Road Improvement Dist. No. 7, John W. Baker, Secy., Higginson, Ark.; construct 17 mi. gravel road; 47,045 cu. yds. gravel; \$300,000; J. A. Burt, Contr., Gunnison, Miss.; E. E. Masburn, Engr., Cotton Plant, Ark. (Lately noted inviting bids.)

Ga., Decatur.—De Kalb County Commr. Roads and Revenues, L. T. Y. Nash, Commr.; improve roads; 17,493 cu. yds. grading; 38,380 sq. yds. paving; gutters, curbs, etc.; bids until Apr. 22; E. V. Camp, Engr., Box 421, Atlanta, Ga. (See Machinery Wanted—Road Construction.)

Ga., Hinesville.—Liberty County Commrs., W. C. Hodges, Clk.; construct roads; vote Apr. 20 on \$200,000 bonds.

Ga., Jackson.—Butts County Commrs., J. O. Gaston, Commr.; construct 5 mi. road; \$45,000 available; vote on bonds.

Ky., Ashland.—Grayson Road Corp. chartered; capital \$75,000; C. E. Bruce, F. M. Faulin, John F. Hager.

La., Gassaway.—Town, R. Lee Boone, Mayor; improve Elk St.; vote May 9 on \$50,000 bonds.

* Ky., Harlan.—Harlan County Commrs.; construct roads and bridges; \$160,000 bonds; Nelson Cory, County Engr.

Ky., Morehead.—State Road Comsn., Joe S. Boggs, Commr., Frankfort, Ky.; construct 7.75 mi. Morehead-Farmers road in Rowan County; Rock asphalt; \$207,776.08; Larue Construction Co., Contr.

Ky., Pineville.—State Road Comsn., Joe S. Boggs, Commr., Frankfort, Ky.; construct 5.3 mi. Bell-Harlan road in Bell County; rock asphalt; \$104,105.27; Bailey Construction Co., Contr.

Md., Baltimore.—Board of Awards; pave 30th St., Walbrook; Parkwood, Shirley and other Aves.; 15,800 sq. yds. sheet asphalt; 1900 sq. yds. vitrified brick gutters; 10,800 lin. ft. concrete curb; 8800 cu. yds. grading; bids

until April 14. (See Machinery Wanted—Paving.)

Miss., Hattiesburg.—City Comms.; improve streets, construct water-works, etc.; contemplate vote on \$400,000 bonds.

Miss., Meridian.—City, Mayor Dabney; pave twenty-fourth Ave., and repair other paved streets; vote May 4 on \$215,000 bonds.

Mo., Independence.—Jackson County Comms.; grade 1 mi. Courtney North road; W. M. Spencer, Contr.

Mo., St. Joseph.—Buchanan County Commissioners; resurface 1.3 mi. Savannah Rd.; asphaltic concrete; \$21,859.89; Metropolitan Paving Co., Contr.

N. C., Bladenboro.—Town, R. C. Bridger, Clerk; improve streets; vote April 6 on \$10,000 bonds.

N. C., Dunn.—Harnett County Comms., Lillington, N. C.; construct 50 mi. roads; clay gravel; \$200,000; P. R. Ashby, Contr., Raleigh, N. C.; W. T. Smith, Engr., Lillington.

N. C., Kenansville.—North Carolina State Highway Comsn. Div. Office, Raleigh, N. C.; construct 11.32 mi. State Highway; Federal-aid Project No. 103; 27,800 cu. yds. topsoil surfacing; 35,069 cu. yds. excavation; bridges and culverts; 37,390 lbs. reinforcing steel; bids until Apr. 7; W. S. Fallis, State Highway Engr. (See Machinery Wanted—Road Construction.)

N. C., Pittsboro.—North Carolina State Highway Comsn., Raleigh, N. C.; construct 12.6 mi. top-soil road between Pittsboro and Orange County line; Project No. 99; \$84,546.92; T. W. Chandler, Contr., Virgilina, Va.

N. C., Salisbury.—City, W. T. Rainey, Clk.; pave streets in Dists. 8, 9, 10, 11, 12 and 13; 28,950 sq. yds. bitulithic, sheet asphalt or concrete paving; 4300 sq. yds. bitulithic resurfacing over macadam; 21,250 lin. ft. granite curb; 4260 sq. yds. gutter; 335 ft. 12 to 24 in. sewers; bids until April 14; J. W. Webb, City Engr. (See Machinery Wanted—Paving.)

N. C., Smithfield.—North Carolina State Highway Comsn., Div. Office Raleigh, N. C.; construct 6.02 mi. State Highway; Federal-aid Project No. 58; 14,667 cu. yds. topsoil surfacing; 27,060 cu. yds. excavation; bridges and culverts; bids until Apr. 7; W. S. Fallis, State Highway Engr. (See Machinery Wanted—Road Construction.)

N. C., St. Pauls.—City, J. C. Lentz, Mayor; improve streets, water-works and sewer system; issue \$125,000 bonds; Carolina Engineering Co., Engr., Wilmington, N. C. (Lately noted to vote.)

N. C., Wadesboro.—North Carolina State Highway Comsn., Raleigh, N. C.; construct 2.8 mi. top-soil road between Peachland and Union County line; \$43,396.45; Gibson Construction Co., Contr., Knoxville, Tenn.; John D. Waldrop, Highway Engr., Raleigh.

N. C., Whiteville.—North Carolina State Highway Comsn. Div. Office, Raleigh, N. C.; construct 7.03 mi. State Highway; Federal-aid Project No. 75; 20,683 cu. yds. topsoil surfacing; 37,286 cu. yds. excavation; bridges and culverts; bids until Apr. 7; W. S. Fallis, State Highway Engr. (See Machinery Wanted—Road Construction.)

Okla., Eufaula.—McIntosh County Commissioners; construct roads; voted \$25,000 bonds.

Okla., Muskogee.—City; repave Okmulgee Ave.; asphalt; \$100,000; J. J. Rooney, Contr.; H. H. White, Engr. (Lately noted to vote.)

Okla., McAlester.—Pittsburg County Commissioners, Charles Hess, Commr.; construct roads; plans \$1,000,000 bond issue.

Okla., Oklahoma City.—Oklahoma County

Comms.; construct hard-surfaced roads; voted \$750,000. (Lately noted to vote.)

S. C., Anderson.—Highway Comsn.; awarded road contracts: Newell Company, 50 mi. road; Wright & Nave Construction Co., Dobbins Bridge road.

S. C., Barnwell.—Town, O. W. Harley, Commr. Public Works; pave streets; extend water-works; construct sewers; voted \$110,000 bonds.

S. C., Charleston.—Charleston Sanitary & Drainage Comsn.; construct 7.384 mi. asphaltic concrete road on Charleston-Savannah highway; 77,883 sq. yds. asphaltic concrete pavement; 46,773 cu. yds. earth excavation; bridges and culverts; bids until April 15; J. Roy Pennell, State Highway Engr., Columbia, S. C. (See Machinery Wanted—Road Construction.)

S. C., Union.—City; improve streets; vote on \$200,000 bonds. Address The Mayor.

Tenn., Columbia.—Maury County Road Commission; gravel and chert roads; \$100,000 available; Frank A. Butler, Engr.

Tenn., Memphis.—Tennessee Dept. Highways, Nashville, Tenn.; construct 7.43 mi. State Highway No. 12 between Memphis and Mississippi State line; 104,600 cu. yds. bituminous macadam surface course; 102,073 sq. yds. reconstructed base course; cement concrete, bituminous concrete, rock asphalt, or sheet asphalt surface course with binder as alternates for bituminous macadam; bids until Apr. 23; W. P. Moore, Ch. Engr., Nashville. (See Machinery Wanted—Road Construction.)

Tenn., Ripley.—Tennessee Dept. Highways, Nashville, Tenn.; construct 7.717 mi. State Highway No. 12 between Ripley and Tipton County line in Lauderdale County; 72,439 sq. yds. bituminous macadam or rock asphalt surface course; 72,439 sq. yds. broken-stone or gravel base course; 46,520 cu. yds. excavation; bridges over 20-ft. span; bids until Apr. 23; W. P. Moore, Ch. Engr., Nashville, Tenn. (See Machinery Wanted—Road Construction.)

Tex., Childress.—City, Dan Williams, Secy.; construct 30,000 sq. yds. street pavement; 40,000 sq. ft. sidewalk; 15,000 lin. ft. curb and gutter; bids until Apr. 2; R. G. Carraway Co., Engr., Gainesville, Tex. (Supersedes recent item. (See Machinery Wanted—Paving.)

Tex., Coleman.—Coleman County Comms.; construct roads; voted \$1,000,000 bonds.

Tex., Comanche.—Comanche County Commissioners; construct roads; vote Mch. 30 on \$1,000,000 bonds.

Tex., Dumas.—Moore County Comms.; construct roads; issue \$30,000 bonds.

Tex., Pittsburg.—Camp County Comms.; construct roads; voted \$535,000 bonds. (Lately noted to vote.)

Tex., Waco.—McLennan County, J. P. Alexander, Judge; .38 mi. Waco-Springfield road; .63 mi. Waco-Axtell road; \$48,760; Byars & Byars, Contrs.

Tex., Wichita Falls.—Wichita County Comms.; construct 4.34 mi. 18-ft. concrete roads; \$2,250,000; Potts & Prentice, Contrs., Waco, Tex.; J. M. Isbell, County Engr. (Supersedes recent item.)

Va., Marion.—Virginia State Highway Commission, G. P. Coleman, Commr., Richmond, Va.; construct 5.71 mi. water-bound macadam road between Adkins and Wythe County line; Virginia Project No. 27; contract let. (Lately noted inviting bids.)

Va., Pearisburg.—Giles County Supvrs.; construct roads; vote Apr. 6 on \$300,000 bonds.

Va., Tazewell.—Virginia State Highway Comsn., G. P. Coleman, Commr., Richmond, Va.; construct 5.25 mi. gravel road between Copenhavers and Russell County line; contract let. (Lately noted inviting bids.)

W. Va., Beckley.—Raleigh County Commissioners, Jackson Smith, Clerk; grade and construct drainage structures on Logan turnpike; 19,000 cu. yds. excavation; 784 lin. ft. 12 to 24-in. pipe; 1500 lin. ft. tile drain; 3000 lbs. reinforcing steel; bids until April 26; C. B. Scott, Highway Engr. (See Machinery Wanted—Road Construction.)

W. Va., Charleston.—Kanawha County Commissioners; improve roads in Washington and Pocahontas Dists.; voted \$85,000 bonds.

W. Va., Logan.—Logan County Comms., Don Chaffin, Clerk; construct 2½ mi. Monitor Junction-Monroville road, Federal-aid Project No. 89; 12.4 mi. Logan to Man Road; bids until April 19. (See Machinery Wanted—Road Construction.)

W. Va., Parkersburg.—City, J. Loyal Gilbert, Mayor; pave sections of 4 streets; 34,080 sq. yds. sheet asphalt, brick and concrete paving; 4000 lin. ft. concrete curbing; 2800 cu. yds. excavation; bids until April 14; L. G. Merrill, City Engr. (See Machinery Wanted—Paving.)

W. Va., Union.—Monroe County Comms.; construct roads in Union Dist.; voted \$120,000 bonds.

Sewer Construction.

N. C., Gastonia.—City, S. G. Fry, Clk.; enlarge and construct sewers; vote on \$145,000 bonds.

N. C., Greensboro.—City; lay 1 mi. sewer and 1½ mi. water mains; total cost \$30,000. Address The Mayor.

N. C., Hickory.—City, R. G. Henry, Mgr.; construct sewer disposal plant; \$21,000; Tucker & Laxton, Contrs., Charlotte, N. C. (Lately noted bids until Mch. 30.)

S. C., Barnwell.—Town, O. W. Harley, Commissioner Public Works; construct sewer system; extend water-works; paving; voted \$110,000 bonds.

S. C., Union.—City; sewer system additions; vote on \$60,000 bonds. Address The Mayor.

Va., Potomac.—Town, J. W. Varney, Mayor; construct sanitary sewers; lay sewer pipes; excavate 30,000 cu. yds. trench; 36,000 lin. ft. 8-in. sewers; 5100 lin. ft. 10 to 12-in., 700 8x6-in. Y branch house connections; 85 manholes; bids until Apr. 27; David J. Howell & Son, Engrs., Union Trust Bldg., Washington, D. C. (See Machinery Wanted—Sewer Construction.)

W. Va., Charleston.—City, Bonner H. Hill, City Mgr.; construct 26,000 lin. ft. 8 to 60-in. storm and sanitary sewers; 30 to 60-in. segment block; T. C. pipe 8 to 24-in.; \$221,689.21; Ernest Bruce, City Engr.; W. J. Weakland & Co., Contrs. (Lately noted bids until Mch. 26.)

Telephone Systems.

Ala., Florence.—Burcham Valley Telephone Co. inceptd.; capital \$3,000; J. O. Wesson.

Ark., Cotton Plant.—S. B. Wilson Telephone Co., inceptd.; capital \$31,000; S. B. Wilson, S. M. Bush, R. T. Gephart.

Okla., Griggs.—Griggs Telephone Co. inceptd.; capital \$5000; John C. Wells, D. M. Smith, A. J. Giles.

S. C., Beaufort.—Beaufort Telephone Co. inceptd.; capital \$35,000; Pat Wall, Prest.; P. E. Bellamy, V.-P.; W. H. Hull, Secy.-Treas.

S. C., Greenwood.—East Greenwood Telephone & Electric Co. inceptd.; capital \$5000; E. H. Williams, Prest.; J. C. Parkerson, V.-P.; J. A. Gresham, Secy.-Treas.; A. F. Snyder, Mgr.

Textile Mills.

Ala., Albany.—Silk Fabrics—Albany Textile Co., H. Ruegg, Jr.; plans enlarging mill, in-

stall 200 looms; mchy. purchased. (Lately noted inceptd., capital \$100,000.)

Ga., Flintstone—Cotton Cloth.—Yates Bleachery Co. inceptd.; capital \$200,000; Don Harris, Chickamauga, Ga.; E. F. Wheland, Chattanooga, Tenn.; erect 200x65 and 260x45 ft. buildings; concrete; 400 H. P.; bleach and finish cotton piece goods; A. E. Yates, Engr.-Archit., Chickamauga, Ga. (Lately noted.)

Ga., Greensboro—Cotton Products.—Mary Leila Cotton Mills; improve plant; \$200,000; W. Z. Williams Co., Contr., Macon, Ga.

Md., Chesapeake City—Cotton Cloth.—Jno. A. Bidwell, Beverly, N. J.; erect 2-story 86½x32-ft. frame construction mill; \$15,000; install 24 looms; mchy. ordered; \$4000 crude-oil plant, 20 H. P.; H. H. Griffin, Contr. Supersedes recent item. See Machinery Wanted—Cotton Machinery; Sewing Machines.)

N. C., Bladenboro—Yarn.—Bladenboro Cotton Mills, J. L. Bridger, Gen. Mgr.; erect 500x103-ft. mill addition; brick and concrete construction; day labor; E. G. Bradford in charge.

N. C., Gastonia—Yarn.—Gastonia Cotton Mfg. Co., Jas. S. Love, Prest., Treas. and Secy.; erect plant addition; install 5200 spindles; purchased \$170,000 mchy.; electric power; daily output 2000 lbs. yarn. (Lately noted increased capital.)

N. C., Raeford—Tire Fabric Yarns.—Hoke Mills Co. organized; Jno. C. Rankin, Prest., Lowell, N. C.; M. M. Tuttle, Secy.-Treas., Raeford; succeeds Raeford Mfg. Co.; change to mfr. tire fabric yarns. (Lately noted inceptd., capital \$600,000.)

N. C., Belmont—Yarn.—Eagle Yarn Mills organized; capital \$300,000; W. B. Puett, Prest.; J. W. Stowe, Secy.-Treas.; install 10,000 spindles; mchy. purchased; dimensions, character of construction and cost of buildings not decided. (W. P. Puett, J. W. Stowe, lately noted organize company.)

N. C., Durham—Hosiery.—Community Hosiery Mills Corp. chartered; capital \$100,000; M. C. Holderfoeld, C. L. Higbess; both East Durham; Harvey Holleman, Apex, N. C.

N. C., Lenoir—Cotton Products.—Indian Creek Mills inceptd.; capital \$250,000; D. P. and Paul Rhodes, M. C. Quickel.

N. C., Randle—Combed Yarn.—Priscilla Spinning Co., Gastonia, N. C.; erect 3-story 313x134-ft. mill-construction building; install 25,000 spindles; mchy. purchased; electric power; J. H. Mayes, Prest.-Treas. and Archit.-Engr., Charlotte, N. C. (Lately noted under Gastonia, N. C.)

N. C., Ronda—Cotton Yarns.—Ronda Cotton Mills, R. D. Grier, Prest.; erect 310x34-ft. main building; brick and concrete; 60x45-ft. powerhouse; 64x45-ft. warehouse; total cost \$50,000; install 7500 spindles; \$150,000 mchy. purchased; \$30,000 electric and steam plant; 300 K. W.; electric drive; G. M. Goodnight, Archit.-Engr. (Lately noted.)

N. C., Taylorsville—Cotton Yarn.—North State Cotton Mill Co. organized; R. A. Adams, Prest.; A. E. Watts, Secy.-Treas.; erect \$75,000 building; brick; contract let; install 5040 spindles; \$50,000 electric plant; electric power; \$100,000 mchy. purchased. Lately noted inceptd., capital \$50,000. (See Machinery Wanted—Spools; Bobbins.)

N. C., Valdeese—Yarn.—Pauline Knitting Mills inceptd.; capital \$125,000; A. F. and Jno. Garrou.

S. C., Columbia—Press Cloth.—Frank T. Parker; erect \$12,000 press cloth mill.

S. C., Landrum—Damask.—Shamrock Damask Mills, H. L. Spears, Prest.-Secy.; erect 80x65-ft. addition; concrete and brick; \$10,000; construction by owner; install 30 looms; purchased \$40,000 mchy.; \$1000 electric plant; 30 H. P.; electric drive; daily capacity 1500 yds. damask. (Supersedes recent item.)

S. C., Greenville—Cotton Waste.—Chester M. Goodyear Co., Chester M. Goodyear, Treas., Main and Hammond Sts.; erect 4-story 250x100-ft. main factory building; mill, construction; steel window frames and sash; 150x50-ft. mill-construction pickery building; 2-story 50x30-ft. office building; brick; install standpipe; total cost \$150,000; \$100,000 mchy.; install present equipment; J. E. Sirrine, Archit.; Neal & Pack, Contrs.

Tenn., Chattanooga—Hosiery.—Nick & Jack Hosiery Mills; increase capital from \$100,000 to \$200,000.

Tenn., Lenoir City—Hosiery.—Kitzmiller-Scott Corp. will organize; include William A. Long, Gen. Supt. Holston Mfg. Co.; build hosiery-knitting mills in Tennessee, Kentucky and Virginia.

Va., Fieldale—Cotton and Woolen Cloth.—Carolina Cotton & Woolen Mills Co., Fieldale, Mills; erect 250x150-ft. sawtooth construction extension; \$100,000; install 300 jacquard towel and crash looms; F. P. Sheldon & Sons, Engrs., Providence, R. I. (Lately noted to build extension.)

W. Va., Martinsburg—Cassimeres.—Dunn Woolen Co., Thos. Dunn, 118 S. Raleigh St.; erect 1 and 2-story 118x42-ft. dyehouse and warehouse; C. E. Kent, Archit., 712 N. Queen St.

Water-Works.

La., Pineville—City, U. T. Downs, Mayor; construct \$55,000 water-works; Wm. Sylvester, Engr., Alexandria, La. (Lately noted voted \$55,000 bonds.)

Miss., Hattiesburg—City; install water-works; improve streets; erect school; vote on \$400,000 bonds. Address The Mayor.

N. C., Gastonia—City, S. G. Fry, Clk.; enlarge and construct water, electric-light and power systems; vote on \$285,000 bonds.

N. C., Greensboro—City; lay 1½-mi. water and 1-mi. sewer mains; total cost \$30,000. Address The Mayor.

S. C., Barnwell—Town, O. W. Harley, Commissioner Public Works; extend water-works; construct sewer system; paving; voted \$110,000 bonds.

S. C., Union—City; extend water-works; vote on \$70,000 bonds. Address The Mayor.

Tex., Belton—City; extend water-works; vote Apr. 6 on \$25,000 bonds. Address The Mayor.

W. Va., Huntington—Huntington Water Co., H. E. Watts, Supt.; construct 20-in. line from 23d St. to reservoir; \$80,000 to \$90,000.

Woodworking Plants.

Ala., Mobile—Shuttle Blocks, etc.—Southern Wood Products Co. inceptd.; capital \$15,000; Russell A. Thompson, Prest.; Frank H. Ross, Secy.-Treas.; mfr. shuttle blocks, treenails, spokes, handles, etc.

Ark., Armstrong Springs—Boxes.—Acme Box Co., Searcy, Ark.; establish plant.

Fla., Apopka—Veneer.—Consumers' Lumber & Veneer Co.; rebuild burned plant; loss \$65,000.

Fla., Jacksonville—Wood Novelties.—Livalite Holder Co. inceptd.; capital \$25,000; Frank D. Brennen, Prest.; P. C. Marion, V.-P.; Ethel Monk, Secy.-Treas.

Fla., St. Petersburg—Automobile Truck Bodies.—Amesbury Mfg. Co. inceptd.; capital \$20,000; C. H. Prestcott, Prest.; B. S. Wright, V.-P.; E. B. Holcomb, Secy.-Treas.

Ga., Atlanta—Furniture.—Luckie Furniture Mfg. Co. inceptd.; capital \$250,000; A. B. Ware, S. J. Griffith, Marion Smith; erect plant; mfr. hotel, college and sanitarium furniture. (Supersedes recent item.)

Ga., Toccoa—Furniture.—Toccoa Furniture Co.; rebuild burned plant; loss \$100,000.

Ga., Toccoa—Furniture.—Toccoa Furniture Co., W. C. Edwards, Prest.; rebuild burned plant; erect 70x150-ft. building; iron sides; construction by owner; install double-end rennower, triple-drum sander, hollow-chisel mortiser, continuous feed glue jointer, double spindle shaper, band resaw, inside molder, pony planer, self-feed rip saw, hand jointer, etc. (See Machinery Wanted—Woodworking Machinery.)

Ky., Louisville—Hardwood.—Evans Stinnett Hardwood Co. inceptd.; capital \$300,000; W. A. Stinnett, L. B. and P. A. Evans.

Ky., Louisville—Flooring.—Lanham Hardwood Flooring Co.; increased capital from \$50,000 to \$100,000.

La., Monroe—Motor Wheels.—Motor Wheel Corp., Lansing, Mich.; establish \$100,000 plant; 6½-acre site.

Mo., Kansas City—Silos.—Twinval Silo Mfg. Co., J. J. Holmes in charge; erect silo factory; 120x65-ft. site.

Mo., St. Louis—Woodenware.—Cruden-Martin Mfg. Co., F. P. Cruden, Prest., 760 2d St.; erect plant; T. P. Barnett, Archit., Arcade Bldg.; Gamble Constr. Co., Contr., 620 Chestnut St.

N. C., Goldsboro—Veneer.—Empire Mfg. Co.; increase capital from \$138,000 to \$500,000.

Okla., Heavener—Furniture.—Oak Leaf Furniture Mfg. Co. inceptd.; capital \$10,000; Henry Mason, Emmett Addison, Marion Castleberry.

Tenn., Memphis—Flooring, etc.—E. L. Bruce Co., F. E. Bruce, Secy., Little Rock, Ark.; erect 120x200, 110x125, 100x100-ft. mill-construction and brick buildings; \$250,000; install \$100,000 woodworking mchy.; purchased; Thrall & Shea, Archts.-Contrs., Lake Charles, La. (Supersedes previous item.)

Tex., Houston—Staves.—Lucas E. Moore Stave Co. inceptd.; capital \$25,000; W. L. Drummond, J. C. Harris, Lucas E. Moore.

Va., Altavista—Woodenware.—Altavista Dogwood Products Corp. chartered; capital \$50,000; F. V. Woodward, Prest.; P. B. Woodward, Secy.

W. Va., Wheeling—Matches.—Wheeling Match Co., O. V. Snyder, Mgr., 31st and Jacob Sts.; rebuild burned plant.

Fire Damage.

Ala., Atmore—J. R. H. Hilton's sweet potato warehouse; loss \$45,000.

Ala., Girard—Butts Lumber Co.'s plant; loss \$100,000.

Ala., Montgomery—Atlantic Compress Co.'s plant; loss \$100,000.

Ala., Phenix City—Butts Lumber Co.'s plant; loss \$100,000.

Ark., Bauxite.—American Bauxite Co.'s commissary, garage and barn; loss \$100,000.

Ark., Little Rock.—Arkansas School for Blind; loss \$15,000; Geo. Thronburgh, Supt.

Fla., Apopka.—Consumers' Lumber & Veneer Co.'s plant; loss \$65,000.

Fla., Daytona.—Ridgewood Hotel. Address The Proprietor.

Fla., Lakeland.—Lakeland Mfg. Co.'s lumber plant, loss \$35,000; Lakeland Steam Laundry, loss \$25,000; C. E. Tood Hardware Co.'s store; F. B. Terrell's blacksmith shop, loss \$5000; Main Street Garage, loss \$6000.

Ga., Vienna.—H. A. Wood's residence near Pinehurst; loss \$15,000.

Ky., Irvine.—Henry Reed's residence.

Ky., Louisville.—P. Bannon Pike Co.'s low-tile works; loss \$50,000 to \$75,000.

Ky., Paintsville.—Proctor Stapleton's restaurant; Howes & Howes' office; Hazlett

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Barber Shop; Singer Sewing Machine Co.'s building; Bailey Bldg.; Robinson's restaurant; loss \$100,000.

La., Alexandria.—Humble Oil Co.'s plant; loss \$30,000.

Md., Baltimore.—A. Rice, Son & Co.'s sales stables, 1608-14 Aliceanna St.; loss \$6000.

Md., Cambridge.—Noah Webster's cannery; loss \$35,000.

Md., Crisfield.—C. C. Spires & Co., G. L. Atkinson, Walter L. Gibson and Jno. E. Sommers' building; loss \$50,000.

Md., Hagerstown.—Benjamin Hartman's garage and Thomas Brezler's stable.

Md., Laurel.—Maryland State Fair, Inc.; stables; loss \$10,000.

Mo., Clark.—L. B. Shields' and P. B. Lefgh's grocery stores, Masonic Hall and Cleeton's drug store; loss \$50,000.

Mo., Liberty.—Second Baptist Church building; loss \$75,000. Address The Pastor.

Md., Mountain Lake Park.—Assembly House; N. M. Shrock's 3 cottages; Wm. Dalley's cottage, Wheeling, W. Va.

Mo., Washington.—Louis J. Aholt and Mrs. Anna Detmer's dwellings, Henry Wilkinson's outbuildings; loss \$25,000.

N. C., Tryon.—Polk County News plant.

N. C., Tryon.—Tryon Paper Box Co.'s plant.

S. C., Anderson.—Walter W. White's residence.

S. C., Honea Path.—C. E. Harper's cotton-oil mill and ginnery.

Tex., Beaumont.—Stedman Fruit Co.'s cold-storage and refrigerating plant; loss \$75,000.

Tex., Big Springs.—Texas & Pacific R. R.'s machine-shop; E. R. Mitchell, Ch. Engr., Dallas, Tex.

Tex., Fort Worth.—W. D. Gason's residence.

Tex., Lockney.—Ben Whitfill & Sons' gin; loss \$40,000.

Va., Coeburn.—Dayton Baker's residence.

J. W. Alnsworth's studio, etc.; loss \$40,000 to \$50,000.

Va., Lynchburg.—Mrs. L. O. Shaner and Venzio Terranova's store buildings.

Va., Lynchburg.—Farmers Seed & Supply Co.'s plant; loss \$3000.

Tex., New Boston.—Exchange State Bank and Fuller Mercantile Co.'s building; loss \$75,000.

W. Va., Buffalo.—H. McCoy's warehouse and store; Wolfe Drug Store; loss \$25,000.

W. Va., Greenbrier Springs.—Miller & Co.'s store and postoffice building.

W. Va., Wheeling.—Wheeling Match Co.'s plant; loss \$10,000.

Damaged by Storm.

Tex., Amarillo.—Green Bros. Furniture Co.'s building; Olympic Theater Bldg.

erect \$20,000 to \$25,000 bank building; 2 stories; brick; tin roof; possibly tile floors. (See Machinery Wanted—Bank Fixtures; Safe; Vault.)

Okla., Elk City.—Farmers' State Bank, care Mr. Hocker; erect bank building; 1 story and part basement; 50x70 ft.; brick, stone and reinforced concrete; fireproof; gravel roof; Hawk & Parr, Archts., Security Bldg., Oklahoma City.

Okla., Oklahoma City.—Liberty National Bank; remodel building; 5 stories and basement; stone and brick; \$125,000; Monnot & Reid, Archts., 409 Empire Bldg.

S. C., St. Matthews.—Home Bank; remodel building for bank.

Tenn., Maryville.—First National Bank; erect \$175,000 bank and office building; 5 stories; reinforced concrete, brick and stone; composition roof; vacuum heating plant; R. Graf & Sons, Archts. and Engrs., Knoxville, Tenn. (Lately noted.)

Va., Lawrenceville.—First National Bank; remodel interior; brick; H. T. Barnham, Archt., Chamber of Commerce Bldg., Richmond.

Va., Petersburg.—Atlantic Coast Realty Co.; erect \$80,000 office building; 2 stories and basement; 50x114 ft.; reinforced concrete, brick; limestone and terra-cotta trim; F. A. Bishop, Archt., Terminal Bldg.

W. Va., Millville.—Standard Lime & Stone Co., J. W. Baker, Prest., Martinsburg, W. Va.; erect 2-story brick building; B. Evard Mepner, Archt., 34 N. Market St., Frederick, Md.

Churches.

D. C., Washington.—Epworth M. E. Church, Rev. Jno. T. Tyler, pastor; expend \$150,000 to rebuild structure noted burned; 1 story; stone and brick; Rich & Bell, Archts., 1301 G St. N. W. (Lately noted.)

Fla., Fort Lauderdale.—Catholic Church; reported to erect \$10,000 building. Address The Pastor.

Ga., Bowman.—Bowman Methodist Church, Rev. L. P. Huckaby, pastor; erect \$25,000 building.

Md., Baltimore.—Church of the Messiah, Peregrine Wroth, Pastor, 215 E. Preston St.; plans to erect building, Harford Rd. and White Ave.

Md., Sparrows Point.—St. John's Evangelical Lutheran Church, 4th and D Sts.; alterations to building; brick and hollow tile; stucco finish; Walter M. Gleske, Archt., Gunther Bldg., Baltimore.

Mo., Albany.—Hills Chapel M. E. Church; considering erecting \$10,000 building. Address The Pastor.

N. C., Aulander.—Baptist Church; erect \$40,000 building. Address The Pastor.

N. C., Reidsville.—St. Paul's Methodist Church; erect church. Address The Pastor.

N. C., Warsaw.—Methodist Church, Rev. E. C. Glenn, Pastor, Faison; erect \$25,000 building; 40x56 ft.; brick; plaster board; rolling partitions; concrete floors; electric lights. Address A. P. Raiford. (Lately noted.)

Okla., Ponca City.—Methodist Church, Henry Buckner, Secy. of Comm.; erect \$60,000 building; 1 story; 60x100 ft.; brick, concrete and stone; asbestos shingle roof; wood and cement floors; bids latter part of April; Butler & Saunders, Archts., Tulsa, Okla. Address Owner. (Lately noted.)

S. C., Columbia.—Green Street Methodist Church; erect Sunday-school building and parsonage. Address The Pastor.

S. C., Fort Mill.—St. John's Methodist Church; erect \$35,000 building; classrooms, auditorium (seat 300); kitchen, heating plant, etc., in basement.

BUILDING NEWS

EXPLANATORY.

Buildings costing less than \$10,000 not covered in these reports.

BUILDINGS PROPOSED

Apartment-Houses.

Fla., Fort Myers.—H. A. Hendry; remodel dwelling for apartments.

Mo., St. Joseph.—Miss Schmitz; remodel residence for apartments; 2 stories and basement; 30x35 ft.; brick; stone trim; composition roof; \$10,000; R. and E. R. Meier, Archt., 203 Lincoln Bldg.

S. C., Greenville.—C. N. Garing; erect apartment building; \$14,000.

Tex., San Antonio.—Mabel D. Holden; erect \$15,000 apartment building; 16 rooms.

Association and Fraternal.

Fla., Tallahassee.—Benevolent Protective Order of Elks; erect building; double piazzas, Corinthian columns, etc.

Fla., Tampa.—Young Men's Christian Assn.; expend \$15,000 to repair building.

Ky., Corbin.—Independent Order of Odd Fellows; erect 3-story brick and terra-cotta building; vacuum heating plant; \$60,000; R. Graf & Sons, Archts. and Engrs., Knoxville, Tenn.

N. C., Clinton.—Masonic Temple Corp., J. H. Stewart, Chrmn.; erect temple; 4 stories; bids opened Apr. 6; plans and specifications at office Henry E. Bonitz, Archt., Wilmington.

S. C., Abbeville.—Abbeville Cotton Mills; erect Y. M. C. A. building.

Tenn., Memphis.—Memphis Trades and Labor Council, Arch. Schwab, Prest.; erect \$250,000 temple; 6 stories; fireproof; concrete; auditorium, seat 1500; meeting halls, pool and billiard rooms, shower baths, etc.; Jones & Furbringer, Archts., Porter Bldg.

Tex., Dallas.—Young Women's Christian Assn., Mrs. W. D. Felder, Prest.; erect admin-

istration building at Swiss and Haskell Aves.; Herbert M. Green, Archt., Scarritt Bldg., Kansas City, Mo. (Previously noted.)

Tex., Houston.—Carpenters' Union, H. S. Smith, Prest.; erect \$120,000 office building; stores, first floor; carpenters' hall, top floor; 50x100 ft.; concrete; heating and lighting plant in basement; Finger & Cato, Archts.

W. Va., Charleston.—Scottish Rite Masons, W. T. Eisensmith, Secy.; remodel building; raise portion of building to 2 stories; construct stage in rear, etc.; H. Rus Warne, Archt.

Bank and Office.

Ky., Ashland.—Ashland National Bank; erect 10-story building.

La., Alexandria.—Alexandria Bank & Trust Co., J. E. McAdams, organized by Citizens' Loan & Investment Co.; expend \$10,000 to remodel building.

La., Mansfield.—American National Bank, Walter M. Robertson, Prest.; erect building.

La., New Orleans.—Gretna Exchange & Savings Bank, Jules G. Fisher, Prest.; erect \$30,000 building; 35x67 ft.; pressed brick; Indiana limestone; burglar-proof vault; marble and mahogany fixtures; Sam Stone, Jr., Archt.

Mo., Kansas City.—Citizens' Security Bank, A. C. Watkins, Prest.; erect \$25,000 bank, store and office building; 2 stories and basement; 80x81 ft.; brick and stucco; stone trim; Brostrom & Drotts, Archts., 401 Reliance Bldg.

N. C., Aulander.—Farmers Bank; reported to erect building.

N. C., Salisbury.—First National Bank, H. P. Brandt, Cashr.; erect \$65,000 building; brick; tile floor; steam heat; A. C. Bossom, Archt., 480 5th Ave., New York.

N. C., Wallace.—Farmers' Bank & Trust Co.;

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

S. C., Laurens.—Rocky Springs Presbyterian Church, Rev. W. D. Ratchford, Pastor, Cross Hill; erect \$16,000 building; brick; Sunday-school room in basement.

S. C., Lockhart.—Baptist Church; bids until May 15 to erect building; lately noted; 50x110 ft.; brick veneer; slate roof; wood floors; plaster board; interior tile; rolling partitions; 15 classrooms, dining-room; auditorium, seat 500; shower baths; steam heat; Casey & Fant, Archts., Anderson, S. C. Address Rev. C. C. Matheny. (See Machinery Wanted—Brick.)

Tenn., Maryville.—First Methodist Episcopal Church; erect \$80,000 building; brick and stone; composition roof; vacuum heating plant; R. Graf & Sons, Archts. and Engrs., Knoxville. (Lately noted.)

Tex., Electra.—First Methodist Church Building Comm.; bids until Apr. 10 to erect building; brick and concrete; plans and specifications at office F. A. Crutchfield and Sparger & Peters, Archts., Bonham.

Va., Harrisonburg.—St. Stephens Reformed Church; erect church and Sunday-school; 2 stories; brick; Chas. M. Robinson, Archt., Times-Dispatch Bldg., Richmond.

Va., Martinsville.—Presbyterian Church; erect \$20,000 Sunday-school room; lately noted; 2 stories and basement; 50x50 ft.; hot-air heat; electric lights. Address C. H. Phipps. (See Machinery Wanted—Building Material.)

Va., Norfolk.—Hallett & Pratt, Mutual Bldg., Richmond; preparing plans for \$25,000 church and Sunday-school near Norfolk; brick; 2 stories.

Va., Petersburg.—Market St. Methodist Church; erect \$250,000 building; colonial design; Kentucky limestone; Edward Rossel Mitchell & Co., Archts., Flatiron Bldg., Norfolk.

Va., Petersburg.—Market Street Methodist Church, G. S. Wright, Chrmn. Building Comm., Washington St.; erect \$250,000 church and Sunday-school building; 1 story; Kentucky limestone; memorial windows; organ, etc.; Edward Rossel Mitchell, Ltd., Archts., Norfolk. (Lately noted.)

Va., Williamsburg.—First Presbyterian Church; erect church and Sunday-school; brick; 1 and 2 stories; 100x100 ft.; hollow tile and stucco; slag roof; pine floor; electric lights; H. T. Barnham, Archt., Chamber of Commerce Bldg., Richmond.

W. Va., Alderson.—Methodist Episcopal Church South, Rev. W. H. Ballenger, pastor; erect \$15,000 addition; 2 stories and basement; 50x57 ft.; brick; G. R. Ragan, Archt., Terry Bldg., Roanoke, Va.

City and County.

Ark., Little Rock—Auditorium.—City, Benj. D. Brickhouse, Mayor; erect auditorium.

Fla., Jacksonville—Improvements.—City, R. M. Rogero, City Clk.; voted \$190,000 bonds for general improvements. Address The Mayor.

Ga., Atlanta—Fire Stations.—Board of Firemasters, W. B. Cody, Chief; erect 2 fire stations; N. S. Hamilton, Archt. (Previously noted.)

Miss., Hattiesburg—City Hall, etc.—City, L. McAuley, Commr.; considering election on \$400,000 bonds; erect city hall, negro school, school for white children, etc.; F. B. Woodley, Supt. of Schools. (Lately noted.)

Mo., Kansas City—Comfort Station.—City; erect \$16,000 underground comfort station; Fredk. Gunn, Archt.; also considering erecting 2 additional stations; Matthew S. Shinick, Supt. of Bldgs.; Robt. W. Waddell, City Engr. (Previously noted.)

Okla., Bristow—Convention Hall, etc.—City; defeated \$100,000 bonds for convention hall and \$10,000 bonds for park improvements. Address The Mayor. (Lately noted.)

Okla., Enid—Auditorium.—City; erect \$200,000 auditorium; 3 stories and basement; 128x230 ft.; brick, stone and reinforced concrete; fireproof; Layton, Smith & Forsyth, Archts., Southwest Natl. Bank, Oklahoma City. (Previously noted.)

Okla., Muskogee—Hospital, etc.—City; votes Apr. 6 on \$275,000 bonds to erect \$150,000 hospital, \$100,000 grandstand and athletic park, \$25,000 to complete Honor Heights Park. Address The Mayor.

Tex., Belton—Fire Stations.—City Council; vote Apr. 6 on \$25,000 bonds to erect fire stations.

Tex., Wichita Falls—Jail.—Wichita County, W. W. Murphy, Auditor; bids until Apr. 12; addition to jail; 8 tool-proof cells, etc.; plans and specifications on file with Mr. Murphy.

Courthouses.

Tex., Dalhart.—Dallam County Comms.; bids until Apr. 12 to erect \$200,000 courthouse; Mann & Gerow, Archts., Hutchinson, Kans.; H. A. Noble, Structural Engr., 411 Reliance Bldg., Kansas City, Mo. (Previously noted.)

Dwellings.

Ark., Texarkana.—Ben Anthony; erect residence.

Ark., Pine Bluff.—Chamber of Commerce; promoting organization of \$100,000 company to erect dwellings.

Ark., Texarkana.—Geo. Conway; erect residence.

D. C., Washington.—Chas. D. Sager, 927 15th St. N. W.; erect 6 dwellings, 943-53 Shepherd St. N. W.; brick; 2 stories; 22x34 ft.; construction by owner.

D. C., Washington.—D. J. Dunigan, Maryland Ave.; erect 7 dwellings 5500 block 13th St. N. W.; \$44,000.

D. C., Washington.—Carl H. Smith, 1921 Biltmore St. N. W.; erect 5 dwellings 1700 block Kenyon St.; \$50,000.

D. C., Washington.—L. E. Breuninger & Sons, Colorado Bldg.; erect 14 dwellings 1600 block Webster St.; \$175,000; erect \$7000 store, 5507 Colorado Ave.

D. C., Washington.—C. H. Small; erect 8 dwellings Allen Pl. N. W.; \$79,000; plans and construction by owner.

D. C., Washington.—Henry L. C. Phipps; alter and erect addition to residence; 2½ stories and basement; frame and stucco; \$25,000; Waddy B. Wood, Archt., 816 Connecticut Ave.

D. C., Washington.—Irvin & Shanks; erect 2 dwellings, 4299 Clay St. N. E. and 4575 Eads St.; C. E. Webb, Archt., 237 Rhode Island Ave.; also residence 4707 Eads St.; J. D. Trent, Archt.; construction by owner.

Fla., Daytona Beach.—Geo. M. Faith; erect \$20,000 residence; plans additional dwellings.

Fla., Miami.—Goodman Investment Co.; erect \$10,000 residence; 2 stories; concrete block.

Fla., Sanford.—Rev. Geo. Hyman, pastor Baptist Temple; erect bungalow.

Fla., St. Petersburg.—C. Perry Snell; erect \$15,000 to \$20,000 residence; W. S. Shull, Archt. Fla., Tampa.—Fred Wolf; erect bungalow.

Ga., Atlanta.—W. J. Davis; erect 7 dwellings; brick veneer; \$52,000.

Md., Baltimore.—Harold C. Hann, 28 Roland Ave.; erect 3 dwellings, Roland Ave. nr. University Parkway.

Md., Baltimore.—Frank Novak Realty Co., Harford Ave. and 25th St.; erect 16 dwellings, 1700 block Chilton Ave.; 2 stories; brick; 14.2x95 ft.; \$96,000.

Mo., Clayton.—J. H. Keebaugh; erect \$10,000

600 residence; 2 stories; 30x34 ft.; brick; W. P. McMahon, Archt., Title Guaranty Bldg., St. Louis.

Mo., Hamilton.—P. A. Switzer; erect \$15,000 residence; 2 stories and basement; 36x50 ft.; brick; stone trim; Brostrom & Drotts, Archts., 401 Reliance Bldg., Kansas City.

Mo., Kansas City.—L. C. Bergsten, 5527 Tracy Ave.; erect 5 dwellings; 2 stories and basement; 24x32 ft.; frame and stucco; shingle roof; \$25,000; plans and construction by owner.

Mo., Kansas City.—W. E. Hoover; erect \$16,000 residence, Mission Drive; 2 stories and basement; frame and stucco; shingle roof; A. H. Buckley, Archt., 821 Gloyd St., receiving bids.

Mo., Kansas City.—C. O. Jones, 301 Commerce Bldg.; erect 7 dwellings; 2 stories and basement; 24x30 ft.; frame and stone; shingle roof; \$28,000; plans and construction by owner.

Mo., Kansas City.—R. J. Smith; erect \$18,000 residence; 38x37 ft.; brick; shingle roof; wood floors; hot-water heat; A. B. Anderson, Archt., 813 New York Life Bldg.

Mo., St. Joseph.—J. E. Buis; erect 3 dwellings, 22d St.; 8 and 10 rooms; frame and stucco; \$20,000.

N. C., Durham.—R. Bruce Mason; erect \$12,800 residence and garage; 1½ stories; 32x61 ft.; frame; slate and tile roof; wood and tile floor; steam heat; Milburn Heister & Co., Archts., 710 14th St. N. W., Washington, D. C.

N. C., Fayetteville.—Dr. R. A. Allgood; erect \$13,500 residence.

Okla., Fort Cobb.—Otto Wray; erect \$10,000 residence; 2 stories and basement; 30x40 ft.; wood floors; composition shingle roof; furnace heat.

Okla., Grandfield.—W. M. Hubbard; erect \$10,000 residence; 2 stories and basement; 30x32 ft.; frame; composition roof; Aurelius Swanson Co., Archts., 1006 First Natl. Bank Bldg., Oklahoma City.

Okla., Holdenville.—Holdenville Home Construction Co., M. T. Chapman, V.-P.; erect dwellings. (See Machinery Wanted—Building Material; Hardware; Sashes; Doors.)

Okla., Mangum.—James Duffy; erect residence.

Okla., Newkirk.—S. H. Stephens; erect \$12,000 residence; 2 stories and basement; 32x44 ft.; brick and hollow tile; W. L. McAtee, Archt., Arkansas City, Kans.

Okla., Oklahoma City.—G. A. Nichols; erect 6 dwellings; frame; \$21,000.

Okla., Oklahoma City.—E. M. Bowen; erect \$18,000 residence; 2 stories and basement; brick veneer; 33x42 ft.; wood floors; clay tile roof; hot-water heat.

Okla., Oklahoma City.—G. A. Nichols, Inc., 301 Southwest Natl. Bank; erect \$18,000 residence; 2 stories and basement; metal lath and stucco; plans by owner.

Okla., Oklahoma City.—A. R. Nelson, 812 First National Bank Bldg.; erect 5 dwellings; 1 story and basement; frame; shingle roof; construction by owner under supervision S. S. Burgett.

Okla., Oklahoma City.—R. R. Bell; erect \$25,000 to \$30,000 dwelling; hollow tile and stucco; tar and gravel roof; probably day labor; Maurice Jayne, Archt., 1104-5 First National Bank Bldg.

Okla., Oklahoma City.—R. H. Garner, American National Bank Bldg.; erect 5 dwellings; 1 story; frame; shingle roof; \$25,000; day labor.

Okla., Tulsa.—J. J. Burke, 306 Cosden Bldg.; erect 3 dwellings and 3 garages; \$87,000.

Okla., Tulsa.—R. W. Castle; erect \$15,000 residence and garage.

S. C., Charleston.—T. L. Losse; erect \$10,000 residence; 2 stories and basement; 28x37 ft.; wood floors; hot-air furnace heat.

S. C., Orangeburg.—O. W. Spehr; erect \$12,000 residence; 2 stories and basement; 30x40 ft.; frame; shingle roof; Aurelius Swanson Co., Archt., 1006 First Natl. Bank, Oklahoma City, Okla.

Tenn., Columbia.—Col. James R. Williamson; erect residence.

Tenn., Knoxville.—Chas. M. Rodgers; erect brick-vener bungalow; steam heat; asphalt shingle roof; \$10,000; Albert E. Gredig, Archt.

Tex., Amarillo.—Ferguson & Martin; erect \$12,000 dwelling.

Tex., Dublin.—Dublin Oil & Refining Co.; erect several dwellings for employees.

Tex., Lufkin.—W. M. Scarborough; erect \$10,000 residence; 8 rooms.

Tex., Waco.—Pio Crespi; erect \$35,000 residence; stucco; Italian renaissance; Milton W. Scott, Archt.

Va., Cape Charles.—Dr. C. L. Nottingham; erect \$15,000 residence; 2 stories; 44x36 ft.; brick; Diehl & Vance, Archts., Virginia-Carolina Bldg., Norfolk.

Va., Emporia.—A. J. Daugherty; erect \$20,000 residence; 2 stories; 50x60 ft.; brick; W. Duncan Lee, Archt., Travelers' Bldg., Richmond.

Va., Norfolk.—Wm. Freeman; erect dwelling; 2½ stories; 40x54 ft.; frame; Wickham C. Taylor, Archt., Citizens' Bank Bldg.

Va., Richmond.—R. D. Adamson; erect \$12,000 residence; 2 stories; 42x54 ft.; hollow tile; W. Duncan Lee, Archt., Travelers' Bldg.

Va., Warrenton.—R. R. Barrett; erect \$50,000 residence, garage and servants' quarters near Warrenton; 2 stories, attic and cellar; 80x40 ft.; stone; bids about Apr. 15; Waddy B. Wood, Archt., 816 Connecticut Ave. N. W., Washington, D. C.

W. Va., Moundsville.—Frederick Zink; erect residence.

Government and State.

Fla., Apalachicola.—Postoffice and Custom-house.—Treasury Dept., Jas. A. Wetmore, Act. Supervising Archt., Washington, D. C.; erect postoffice and custom-house; 45x60 ft.; 32 ft. high; 2½ stories; R. P. Farnsworth & Co., New Orleans, lowest bidders at \$96,923 for limestone construction. (Lately noted.)

Va., Front Royal.—Postoffice.—Treasury Dept., Jas. A. Wetmore, Acting Supvr. Archt., Washington, D. C.; erect \$41,800 postoffice.

Hospitals, Sanitariums, Etc.

Ala., Tuscaloosa.—Board of Commrs., D. B. Robertson, Prest.; vote Apr. 19 on \$50,000 hospital bonds. (Lately noted.)

Md., Laurel.—Brightwood Sanitarium Co., Dr. Carl Holstrom in charge; erect group of buildings; 6 wings, 42x160 ft., connected by 1-story corridor 50x100 ft.; fireproof; electric baths; porches; laundry in basement; central heating plant and power-house; Stern & Tomlinson, Archts., Washington, D. C.

Okla., Muskogee.—City votes Apr. 6 on \$275,000 bonds to include \$150,000 hospital, etc. (See City and County.)

Okla., Muskogee.—City; votes Apr. 6 on \$200,000 bonds to erect hospital, etc. (See City and County.)

S. C., Gaffney.—Dr. R. T. Ferguson; erect \$50,000 hospital; lately noted; brick; tile roof; terrazzo and oak floors; interior tile; hot-water heat; electric elevators; city lighting; bids in about 60 days; C. M. Robinson, Archt., Times-Dispatch Bldg., Richmond, Va. Address owner.

Hotels.

Fla., Ormond.—E. W. Grove; will not erect hotel as lately reported.

Ga., Atlanta.—C. R. and H. R. Cannon; remodel and erect 2-story addition to Cecil Hotel; also erect 5-story structure in connection; \$150,000.

Md., Cumberland.—Albert A. Doub and associates; reported to erect \$1,000,000 hotel; 200 rooms.

S. C., Charleston.—Francis-Marion Hotel, T. T. Hyde, Prest.; erect 10 to 12-story hotel; 275 rooms.

S. C., Greenville.—Hotel Imperial, C. S. James, Prop.; erect 10-story annex; 50x90 ft.; 100 rooms with private bath; reinforced concrete and hollow tile; heating plant; elevators; connected to main building by steel bridge; \$250,000; J. J. Baldwin, Archt., Anderson, S. C. (Previously noted.)

S. C., St. Matthews.—J. L. Harley; remodel hotel.

S. C., Union.—Chamber of Commerce; promoting erection \$125,000 hotel.

Tex., Sonora.—Sonora Hotel Co., E. W. Hardgrove, Secy.; erect \$110,000 hotel; 3 stories and basement; 90x100 ft.; reinforced concrete; composition roof; concrete slab floors; Arthur R. Swartz, Archt., San Angelo, Tex.; owner will purchase materials. (Lately noted.)

Va., Chatham.—Hotel Bennett; erect addition.

Va., Fairfax.—R. Walton Moore and Thos. R. Keith; expend \$12,000 to remodel The Tavern.

Va., West Point.—Chas. M. Robinson, Times-Dispatch Bldg., Richmond; preparing plans for 50-room hotel; brick; 2 stories.

W. Va., Pence Springs.—Pence Springs Hotel, J. W. Hayles, Mgr.; expend \$50,000 to improve and erect additions; erect golf clubhouse to accommodate 20; dancing pavilion, 38x60 ft.; swimming pool; Jno. R. Gieske, Archt., Huntington.

W. Va., Princeton.—Frank Gnaes; erect \$30,000 hotel and restaurant; 3 stories; 60 rooms.

Miscellaneous.

D. C., Washington.—Home.—Soldiers' Home, Gen. I. W. Little, Supt.; erect dining hall and dormitory; Boyle-Robinson Construction Co., Evans Bldg., Washington, lowest bidder at \$733,619; Alfred Granger, Archt., 332 S. Michigan Ave., Chicago. (Lately noted.)

Ky., Lexington.—Swimming Pool.—Victor K. Dodge and Fred Bryant; construct concrete and steel swimming pool and skating rink; open-air framework.

Ky., Owensboro.—Clubhouse.—Country Club, Silas Rosenfeld, Chrmn. Bldg. Com.; erect dance hall annex; 36½x80 ft.; construct swimming pool; C. W. Kimberlin, Archt.

La., Monroe.—Orphanage.—State Baptist Orphanage; erect \$300,000 building. Address Dr. R. J. Pirky.

La., New Orleans.—Clubhouse.—Southern Yacht Club, Thos. Sully, Chrmn. Building Comm.; expend \$225,000 to remodel and enlarge clubhouse; erect 2-story wing; improve approaches and roads; deepen basin; construct wharves; Rathbone De Buys, Archt.; John Reiss and H. N. Moody, Contrs. (Lately noted.)

Miss., Clarksdale.—Clubhouse.—T. L. Moreau, 146 S. Dearborn St., Chicago, Ill., Landscape Archt. for \$125,000 clubhouse, golf course and residential park; Wm. B. Langford, Golf Course Archt., Clarksdale.

Md., Laurel.—Stables.—Maryland State Fair, Inc.; rebuild stables noted burned at loss of \$10,000.

Okla., Tulsa.—Amusement Park.—Tulsa Live-stock & Industrial Exposition Co.; construct swimming pool, 50 sand beach dressing-rooms, dancing pavilion, exhibition building; circulating, purifying and tempering devices for amusement park; \$1,000,000; Holcombe Engineering Co., Archt. and Engr., 406 S. Cincinnati St. (Previously noted.)

S. C., Greer.—Studio.—C. W. Grace; erect 3-story brick building; \$10,000.

Tenn., Memphis.—Clubhouse.—Colonial Club, S. F. McDonald, Prest.; erect \$200,000 clubhouse to replace previously noted burned structure; install sprinkler system; remodel golf links.

Railway Stations, Sheds, Etc.

Okla., Grandfield.—Chicago, Rock Island & Pacific R. R., 139 W. Van Buren St., Chicago; erect \$15,000 freight and passenger depot; 1 story; 24x75 ft.; frame; A. T. Hawk, Archt. and Engr., care owner; taking bids. (Previously noted.)

Schools.

Ark., Okay.—School Board; erect \$25,000 school; bonds voted.

D. C., Washington.—Board of Education, 13th and K Sts.; erect Eastern High School.

D. C., Washington.—Augustinian Order, Rev. Father F. J. McShane, 1041 Lawrence St., Brookland, D. C.; erect 4-story building, Harewood Rd.; 75x200 ft.; stone and marble; Jno. J. Kennedy, Archt., Ford Bldg., Wilmington, Del.

Ga., Decatur.—Board of Education; vote on \$125,000 bonds; erect \$100,000 high school.

Ga., Jackson.—Board of Education; remodel and erect 4-room addition to high school; install heating plant; \$15,000 to \$20,000.

Ga., Kirkwood.—Board of Education; vote May 1 on \$55,000 bonds; erect school.

Ky., Catlettsburg.—Board of Education, B. B. Triplett, Chrmn.; erect school in Ed. Div. No. 3, Sub. Dist. No. 13; bids until Apr. 12; plans and specifications at office Mr. Triplett.

Ky., Winchester.—Clark County Board of Education; rejected bids to erect \$80,000 high school and auditorium; classroom building, 196x61 ft.; auditorium, 75x95 ft.; brick; hollow tile and frame; Johns-Manville built-up roof; wood floors; J. W. Crone & Son, Archts. (Lately noted.)

La., Wisner.—Board of Education, Jno. L. McDuff, Supt.; bids until Apr. 15; erect \$40,000 high school; 2 stories; brick; 6 classrooms and auditorium; plans and specifications at office Edw. F. Neild, Archt., Shreveport. (Lately noted.)

Md., Chewsville.—Washington County Commissioners, R. E. Staley, Supt., Hagerstown; plan to erect \$15,000 school; 2 stories; brick; A. J. Klinkart, probable Archt., 54 W. Washington St., Hagerstown. (Lately noted.)

Md., Emmitsburg.—Frederick County Board of Education, G. Lloyd Palmer, Supt., Frederick; erect \$50,000 school; 6 to 8 rooms; fireproof; brick; hollow fireproof tile; concrete and hardwood floors; slag roof; ornamental terra-cotta; steel sash and trim; ventilators; heating, \$2000; lighting, \$400; bids opened about July or August. (Lately noted.)

Md., Hancock.—Washington County School Commrs., R. E. Staley, Supt., Hagerstown; plan to erect \$60,000 building; 2 stories; brick; A. J. Klinkart, probable Archt., 54 W. Washington St., Hagerstown. (Lately noted.)

Miss., Hattiesburg.—City, L. McAuley, Commr.; considering election on \$400,000 bonds; erect schools, etc. (See City and County.)

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

Miss., Lake.—A. Wilkins; erect brick school; composition roof; bids about Apr. 15; P. J. Krouse, Archt., Meridian, Miss.

Mo., Cape Girardeau.—Board of Education, Elizabeth Walther, Secy.; erect \$55,000 grade school; fireproof; brick; stone trim; tar and gravel roof; steam heat with mechanical ventilation; bids until April 26; J. H. Felt & Co., Archts., Grand Avenue Temple Bldg., Kansas City, Mo. (Lately noted.)

N. C., Elon College.—Elon College Trustees; erect chemical laboratory; fraternity-house for Kappa Sigma Mu and Sigma Phi Beta.

N. C., Franklinton.—School Trustees, A. H. Vann, Chrmn.; erect \$100,000 building.

Okla., Ardmore.—Dept. Interior, Office Indian Affairs, Washington, D. C.; erect brick dormitory and dairy barn at Bloomfield Seminary; G. W. Stiles Construction Co., 11 S. La Salle St., Chicago, Ill., lowest bidder, at \$84,880 and \$13,686. (Lately noted.)

Okla., Hartshorne.—Board of Education, Judge Hulsey, Clerk; erect \$42,000 school; 2 stories and basement; 100x52 ft.; brick and stone; semi-fireproof; gravel roof; Monnot & Reid, Archts., Empire Bldg., Oklahoma City; plans to issue \$50,000 bonds.

Okla., Mangum.—Board of Education, D. F. Covington, Clk.; erect high-school and convention hall; 428x130 ft.; 3 stories and basement; steel, reinforced concrete and face brick; fireproof; 20 classrooms, laboratory, public library, gymnasium; convention hall to seat 1200; bids until Apr. 12; plans and specifications at office Hawk & Parr, Archts., Security Bldg., Oklahoma City. (Lately noted.)

Okla., Miami.—State Board of Public Affairs, H. V. Bird, Secy., State Capitol, Oklahoma City; erect \$100,000 building at School of Mines; main wing 59x99 ft.; 2 stories; 23x57-ft. wing at each end; 1 story; brick, stone and reinforced concrete; fireproof; gravel roof; Hawk & Parr, Archts., Security Bldg., Oklahoma City.

Okla., Ponca City.—Board of Education; erect junior high school, 2 stories; also grade school, 2 stories and part basement; both structures brick, stone and reinforced concrete; fireproof; gravel roof; Layton, Smith & Forsyth, Archts., Southwest National Bank Bldg., Oklahoma City. (Lately noted.)

Okla., Tonkawa.—Board of Education; erect 60x62-ft. addition to school; 2 stories and basement; brick; stone trim; composition roof; S. S. Voigt, Archt., Fourth National Bank Bldg., Wichita, Kans.

S. C., Rock Hill.—Rock Hill School Dist. Trustees; plan to issue \$75,000 bonds to erect colored school and grammar school for whites.

Tenn., Maryville.—Maryville College; erect building; 210x169 ft.; brick; wood floors; R. F. Graf & Sons, Archts. and Engrs., Knoxville. (Lately noted.)

Tenn., Memphis.—Board of Education, G. W. Garner, Secy.; bids until Apr. 12 to erect addition to Lauderdale school and Cummings school; separate bids for plumbing, heating and electric wiring; Jones & Furbringer, Archts., Porter Bldg.

Tex., Bastrop.—Board of Education; erect \$30,000 high school; 2 stories; 58x60 ft.; brick and stucco; H. F. Kuehne, Archt., Littlefield Bldg., Austin.

Tex., Clarendon.—Texas College; erect addition wing to girls' hall; install central heating plant.

Tex., Eldorado.—Eldorado Independent School Dist. Trustees; erect brick school and repair present structure; vote Apr. 10 on \$30,000 bonds.

Tex., Fort Worth.—Board of Education; erect public school in South Fort Worth; plans to issue \$35,000 bonds.

Tex., Mercedes.—Mercedes Independent School Dist.; erect \$75,000 high school; 1 story; 217x157 ft.; brick and stucco; H. F. Kuehne, Archt., Littlefield Bldg., Austin.

Tex., Strawn.—School Board; erect high school; T. J. Galbraith, Archt., and J. P. Hubbell, Asso., Slaughter Bldg., Dallas.

Tex., Ranger.—Ranger School Dist. Trustees; erect schools; \$200,000 bonds voted.

Va., Pocahontas.—Board of Education, A. S. Greever, Div. Supt.; enlarge school; gymnasium, etc.

W. Va., Fairmont.—Board of Education; erect school near Jayenne school; building at Barrackville; vote Apr. 20 on \$98,000 bonds.

W. Va., Grantsville.—Board of Directors, T. C. Cain, Secy.; erect high school; bids until Apr. 30; Stephen W. Ford, Archt., Clarksburg, W. Va.

W. Va., Huntington.—Board of Education, Clarence L. Wright, Supt.; erect 12-room addition to Simms School; \$100,000; bids until Apr. 28; erect South Junior High School; W. A. Meador, Archt.; also 8-room addition to Miller School; Wm. Francis Diehl, Archt. (Lately noted.)

W. Va., Morgantown.—State Board of Control, Charleston; erect law building at West Virginia State University; 137x55 ft.; 2 stories and basement; fireproof; face brick exterior; stone and terra-cotta trim; interior wood finish, birch-mahogany; main corridors and stairway, marble; interior partitions, hard tile; composition roof; patent plaster; maple, tile and linoleum floors; basement to contain locker-rooms, toilets, clubrooms, machinery-room; first floor, 3 classrooms, practice court, girls' clubroom; second, reading-room, offices, etc.; separate bids until May 1 for general contract, electric wiring, plumbing, heating; plans and specifications at office Chas. W. Bates, Archt., Wheeling. (Previously noted.)

Stores.

D. C., Washington.—Chas. W. King, Jr., 920 New York Ave.; erect \$15,000 store and apartment; 3 stories; 22x60 ft.; construction by owner; N. R. Grim, Archt., 1519 H St.

D. C., Washington.—Wm. Conradis, 1025 7th St. N. W.; erect \$30,000 store and apartment building; 3 stories and basement; 25x85 ft.; concrete and frame; hollow fireproof tile; interior tile; slag roof; wood and concrete floors; metal doors; wire glass; safes; hot-water heat; electric lights; bids opened April 6; Sonneman & Justement, Archts., 734 15th St. N. W. (Lately noted.)

Ga., Columbus.—W. T. Heard; remodel and erect addition to 3 stores.

Ky., Ashland.—W. E. Faulkner Co., remodel building for addition to store.

Ky., Ashland.—McClintock-Field Co.; erect \$60,000 building; 3 stories; 80x142 ft.; brick, steel and frame; 3-ply composition roof; yellow-pine floors; metal ceilings and doors; wire glass; steel sash and trim; low-pressure steam heat; electric lights; 1 freight and 1 passenger elevator, \$7500. Address Jno. R. Geske, Archt., Ashland and Huntington, W. Va. (Lately noted.)

Ky., Hopkinsville.—J. H. Anderson; erect \$225,000 store and office building; 3 stories; reinforced concrete, brick and terra-cotta; freight and passenger elevator; vacuum steam heat; vacuum-cleaning system; R. Graf & Sons, Archts. and Engrs., Knoxville, Tenn. (Previously noted.)

Ky., Lexington.—Dr. J. B. Johnson, Louisville; remodel 2-story brick building for store

and offices; \$10,000; Frankel & Curtis, Archts.

La., Monroe.—Southern Hardware Co.; receives bids until Apr. 8 to erect store building; brick; \$75,000; plans and specifications with Wm. Drago, Archt., and L. Milton King, Asso. Archt.

La., New Orleans.—W. T. Grant & Co., 28 W. 23d St., New York; remodel store.

Miss., McComb.—Sauls Grocery Co.; erect \$15,000 building.

Miss., Philadelphia.—W. C. Houston; erect business block.

Mo., Kansas City.—Clinton Construction Co.; erect 100x100-ft. building; 5 stories; 2 stories and basement; brick; stone trim; composition roof; F. E. Parker, Archt., American Bank Bldg.

Okla., Oklahoma City.—Trave-Trammel Co., 116½ W. 1st St.; erect \$20,000 business building; 1 story and basement; 50x140 ft.; brick, stone and reinforced concrete; construction by owner under supervision of E. J. Trave.

Tenn., Memphis.—F. B. Gianotti; erect 1-story brick building; contain 8 stores; \$60,000.

Tex., Amarillo.—Avery Company of Texas, C. A. McCline, Prest., Dallas; erect 2-story building.

Tex., Dallas.—Avery Company of Texas, C. A. McCline, Prest.; remodel building and erect structure adjoining; \$20,000.

Tex., El Paso.—Joe Dunne; erect \$10,000 building.

Tex., Amarillo.—J. D. Ingram; erect \$50,000 business building; 3 stories; reinforced concrete.

Va., Alexandria.—Sperling & Sperling; erect 3-story store and apartment-house; 28x75 ft.; brick; W. Leon Clark, Archt., 917 Prince St.; receiving bids.

Va., Norfolk.—A. F. Cathey, Mgr. Coca-Cola Bottling Works; erect \$10,000 building; 1 story; 25x110 ft.; hollow tile; B. F. Mitchell, Archt., Seaboard Bldg.

Theaters.

N. C., Reidsville.—D. A. Hendrix; remodel old Primitive Baptist Church for theater; seating capacity 1200.

Tex., Fort Worth.—Pantages Theater; erect \$400,000 to \$500,000 building; seat 2400; main auditorium 100x200 ft.

Warehouses.

Ga., La Grange.—F. C. Ferrell; erect sweet-potato storage-house; 10,000-bu. capacity.

Ga., Savannah.—City; erect 80x250-ft. warehouse; concrete foundation; frame with corrugated iron sides; composition roof; wood floors; \$30,000. Address J. A. McLeod, Asst. Engr. Savannah & Atlantic Railway. (Lately noted.)

La., Lake Charles.—H. W. Lanz; erect bonded rice warehouse; 100x200 ft.; sheet iron; capacity 25,000 to 40,000 sacks rice.

Mo., Kansas City.—Kansas City Power & Light Co., J. F. Porter, Prest.; erect \$250,000 warehouse; 250x1200 ft.; concrete and brick; gravel roof; cement floors; freight elevators; plans and construction by owner. (Lately noted.)

S. C., Greenville.—J. L. Goodenough; erect moving-picture theater.

Tex., Robstown.—William Bauer, Prest. of company with \$20,000 capital, to erect cotton warehouse.

BUILDING CONTRACTS AWARDED

Apartment-Houses.

Mo., Kansas City.—F. Cheatham; erect 3 apartment buildings; 3 stories and basement; 33x62 ft.; 12 suites each; Max Morris, Contr., 3916 Charlotte St.

Okla., Oklahoma City.—J. H. Goldstein; erect \$12,000 apartment building; 2 stories and basement; 40x65 ft.; 4 suites; brick veneer; stone trim; composition roof; Bailey & Alden, Archts., Colcord Bldg.; J. W. Lucas, Contr., 701 W. 17th St. (Lately noted.)

Tex., Fort Worth.—M. Lucas; erect \$50,000 apartment building; 2 stories; 85x90 ft.; brick and hollow tile; 4-ply built-up roof; oak floors; hot-air heat, \$3000; electric lights; M. C. Parker & Co., Archts., 306-7 D. H. Keene Bldg.; Henry A. Spukler, Contr., 305 Keene Bldg. (Lately noted.)

Association and Fraternal.

Okla., Guthrie.—Scottish Rite Masons, Frank A. Derr, Secy.; erect \$1,500,000 consistory; 3 stories and basement; 253x208 ft.; Hawk & Parr, Archts., 501 Security Bldg., Oklahoma City; James Stewart & Co., Contrs., 30 Church St., New York. (Previously noted.)

Bank and Office.

Ark., Little Rock.—Exchange Natl. Bank; erect \$400,000 bank and office building; 50x140 ft.; 5 stories; reinforced concrete; concrete floors; Thompson & Harding, Archts.; Geo. W. Donaghey, Contr.; Matt Bush & Bros., Asso. (Lately noted.)

D. C., Washington.—Medical Society of District of Columbia, Dr. W. G. Morgan, Prest.; erect \$75,000 building; 2 stories; 50x110 ft.; Marsh & Peters, Archts., 520 13th St.; W. P. Lipscomb, Contr., District National Bank Bldg. (Lately noted.)

Ga., Columbus.—Merchants and Mechanics' Bank, J. S. Key, Prest.; remodel and erect addition; 30x140 ft.; brick; metal roof; marble floor; hot-air heat; electric lights; steel and concrete sidewalks; \$60,000; T. W. Smith, Archt., Columbus; M. C. Barlow, Contr.; Krueger Mfg. Co., Atlanta, Ga., fixtures, \$30,000.

Mo., St. Joseph.—American Natl. Bank; expend \$30,000 to remodel building; Walter Bosen, Archt., Tootle-Lacey Bldg.; Sam Hotchkiss, Contr., 18th and Penn Sts. (Lately noted.)

Tenn., Knoxville.—Fidelity Trust Co.; expend \$35,000 to remodel store for bank building; 27x150 ft.; install fixtures, heating plant, safety vaults; Tennessee interior marble finishing; Thomas & Turner, Contrs.; Fred Cantrell & Co., heating; Manley & Young, Archts.; cli of Knoxville.

Tex., Sherman.—American Bank & Trust Co., Lee Simmons, V.-P.; remodel building; marble fixtures to Walter Collins, Denison; steel-lined vault to Moser Safe Co.

Churches.

Ark., Little Rock.—First Presbyterian Church; erect building; John P. Almand, Archt.; Herman & McCain, Contrs.

Md., Baltimore.—Wilhelm Park Christian Church; erect \$13,000 building cor. Cowan and Wilhelm Ave.; 33.6x55 ft.; frame; slate roof; steam heat, \$600; electric lights, \$250; sidewalks, \$125; B. W. Minor, Archt.-Contr., 224 W. Pratt St. (Lately noted.)

Md., Baltimore.—Summerfield Methodist Episcopal Church; erect building, Poplar Grove St. and Calverton Rd.; stone exterior; 2 stories; wood floors; steam heat; non-fireproof; tin, slate and slag roof; electric lights; hollow fireproof tile; ventilation; 48x

110 ft., with wing 56x29 ft.; Wyatt & Nolting, Archts., 1012-15 Keyser Bldg.; Hicks, Tase & Norris, Contrs., 106 Madison Ave. (Lately noted.)

Tex., Clarendon.—First Church of Christ; erect \$20,000 building; 68x68 ft.; brick veneer; shingle roof; wood floors concrete basement; hot-air heat \$800; electric lights; W. I. Mills, Contr. Address P. R. Huckleberry, Box 493. (Lately noted.)

Dwellings.

D. C., Washington.—Mrs. J. B. Henderson, 200 16th St. N. W.; erect \$150,000 building 16th St. and Park Rd.; 4 stories; 70x100 ft.; Geo. O. Totten, Jr., Archt., 808 17th St. N. W.; Wm. P. Lipscomb, Contr., 1405 F St. N. W. (Lately noted.)

D. C., Washington.—W. S. Phillips; erect number of dwellings, 16th St. and Columbia Rd.; 2½ stories and basement; 20x46 ft.; Wm. Todd, Contr., 1409 New York Ave.

D. C., Washington.—J. H. Davis; erect \$15,000 residence; 2½ stories and basement; W. E. Mooney, Contr., Evans Bldg.

Fla., St. Petersburg.—Jno. H. Rex, Norristown, Pa.; erect residence and garage; 2 stories; tile and stucco; Spanish tile floors; Henry H. Dupont, Archt.; Oscar C. Weaver, Contr.

Fla., St. Petersburg.—Karl Jungbluth; erect \$20,000 residence; 40x50 ft.; brick and stucco; cement-tile roof; wood floors; 6 rooms; 2 baths; W. S. Shull, Archt.; Chas. DuBoise, Contr. (Previously noted.)

Ga., La Grange.—Unity Cotton Mills; erect 75 employes' dwellings to replace structures damaged by storm; contracts let.

Ga., Greensboro.—James Bayne; erect \$40,000 dwellings; W. Z. Williams Co., Contr.

Md., Brunswick.—Wm. O. Rau; erect residence on Brunswick-Petersville Rd.; Chas. B. Karn, Contr.

Md., Chevy Chase.—L. R. Moss, 13th St. and New York Ave., Washington, D. C.; erect 2 dwellings; 2½ stories and basement; \$27,000; Frank Simpson, Contr., Chevy Chase.

Mo., Kansas City.—Morrow Investment Co., 424 Rialto Bldg.; erect 5 dwellings; 1 story and basement; 24x40 ft.; R. F. Jarman, Contr., 2507 E. 37th St.

Mo., St. Louis.—Mrs. Joseph Barry; erect \$15,000 residence and garage; 2½ stories; 36x33 ft.; E. Freisler, Archt., Title Guaranty Bldg.; Aug. Beckemeier, Contr., 3855 Humphrey St.

Mo., St. Joseph.—North St. Joseph Loan & Investment Co.; erect 2 dwellings; 2 stories and basement; 26x28 ft.; also 6 dwellings; 1 story and basement; 21x26 ft.; \$28,000; Chas. Norris Construction Co., Contr., 11th and Mitchell Sts.

Mo., St. Louis.—Jas. W. Bemis, V.-P. Ozan Lumber Co.; erect \$80,000 residence; 1½ stories and basement; 90x45 ft.; P. J. Bradshaw, Archt.; R. W. Morrison, Contr.; both International Life Bldg.

Okla., Tulsa.—C. W. Singleton; erect 2 residences and garages; 1 story and basement; 28x42 ft.; \$18,000; Sullivan Bros., Contr., 11 E. Fair St. (Lately noted.)

Okla., Tulsa.—J. C. Reddin; erect \$10,500 residence and garage; 2 stories and basement; 26x36 ft.; E. R. Hayes, Contr., 2638 E. 8th St.

Okla., Tulsa.—H. E. Hanna; erect \$15,000 residence and garage; 2 stories and basement; 34x42 ft.; A. G. Sutton, Contr., 1022 S. Rockford Ave.

Okla., Tulsa.—Bernard Douglas; erect \$10,000 residence and garage; 1 story and basement; 32x46 ft.; M. B. Fleming, Archt.; W. M. MacGregor, Contr.; both 405 Kennedy Bldg.

Okla., Tulsa.—A. K. Dawson; erect \$10,000 residence and garage; 1½ stories and basement; 35x52 ft.; O. Kurbatsky, Contr., 1631 S. Rockford St.

S. C., Greenville.—L. H. Stringer; lately noted; erect \$30,000 residence; 2 stories; 70x48 ft.; brick veneer; slate roof; oak floors; heating undecided; Martin & Ward, Archts.; Wm. Jordan, Contr. (See Machinery Wanted—Heating Plant.)

Tex., Austin.—Wm. Scarbrough; erect \$22,000 residence; 2 stories; 30x65 ft.; Edwin C. Kreisler, Archt., 803 Scarbrough Bldg.; Geo. Fiegel, Contr., 411 Lavaca St.

Va., Winchester.—J. M. Orndoff; erect \$12,000 residence; 2 stories; 42x52 ft.; hollow tile and stucco; Edmonds & Richards, Archts.-Contrs., 32 Rouse Ave.

Government and State.

Tex., Galveston.—Boathouse, etc.—United States Quarantine Station, Dr. R. J. Wilson in charge; erect combination store and boat-house, 75x40 ft.; dredge boat basin, 100x60 ft., at Pelican Spit; total cost \$45,000; M. F. Lynch of Supervising Archt.'s Office, Washington, D. C., supervise construction; John Jacobson, Contr., 315 22d St. (Lately noted.)

Hospitals, Sanitariums, Etc.

La., Shreveport.—North Louisiana Sanitarium, Dr. Louis Abramson, Prest.; erect \$500,000 building; 5 stories; Edward F. Nield, Archt., Commercial Bank Bldg., Shreveport; landscape work, Myron H. West, Prest., American Park Builders, Chicago, \$20,000; Garson Bros., Contr., Shreveport. (Lately noted.)

Mo., St. Joseph.—Methodist Hospital; erect \$300,000 hospital; remodel residence for nurses' home; J. W. Lehr, Contr.

Tex., Gonzales.—Dr. Geo. Holmes; erect hospital; 2 stories and basement; fireproof; 26 rooms; brick; steam heat; contract let.

Hotels.

Ala., Decatur.—Lyons' Hotel; erect \$50,000 addition; 4 stories; 37 rooms with bath; O. W. Baxter, Contr.

Ky., Middlesboro.—J. T. Alderson; remodel and erect additional rooms to Booneway Inn; Alf Miller, Contr. (Lately noted.)

Md., Cumberland.—Central Investment Co., care J. L. Punderson, Queen City Hotel; erect \$160,000 hotel and cafeteria; 69x100 ft.; 5 stories and basement; brick, steel and concrete; 5-ply slag roof; steel I beams and wood-joint floor construction; low-pressure steam heat; concrete sidewalk; electric elevator; T. W. Biddle, Archt., care Kelly Springfield Tire Co.; W. J. Morley, Contr., 98 Bedford St. (Lately noted.)

Miss., Yazoo City.—Geo. Nicholas; erect 2-story addition to Broadway Hotel; \$60,000; N. W. Overstreet, Archt., Jackson, Miss.; T. S. Leake & Co., Contrs., 608 S. Dearborn St., Chicago, Ill. (Lately noted.)

N. C., Gastonia.—Armington Hotel Co.; erect \$150,000 building; brick and concrete; tin roof; wood and tile floors; steam heat; Chas. C. Wilson, Archt., Columbia, S. C.; J. A. Gardner, Contr., Charlotte, N. C. (Lately noted.)

Tex., San Juan.—San Juan Hotel Co.; erect \$40,000 hotel, lately noted; 123x34 ft.; 2 wings; mill construction; built-up asphalt roof; wood floors; hot-air heat; electric lights; H. L. Slaughter, Archt.; Neuman Bros., Contrs. (See Machinery Wanted—Heating Plant.)

Va., Roanoke.—Nackley & Thomas; erect hotel; 100x50 ft.; brick; asphalt roof; rift pine floors; G. R. Ragan, Archt., Terry Bldg., Roanoke; W. H. Mason, Contr., Starkey, Va. (Lately noted.)

Va., Roanoke.—Viscose Co., Marcus Hook, Pa.; erect girls' hotel; 3 stories and basement; 118x191 ft.; 3 wings; steel-gauge construction and brick wall; terra-cotta trim; 114 sleeping-rooms, sewing-room, library, reading-room, gymnasium, dispensary, laundry and cafeteria, servants' quarters; plumbing, heating, vacuum-cleaning system, electric lights; push-button electric elevators; D. J. Phipps, Contr., Roanoke; Ballinger & Perrot, Archts. and Engrs., 17th and Arch Sts., Philadelphia, Pa., will supervise construction. (Supersedes recent item.)

Miscellaneous.

N. C., High Point.—Exposition Building.—Southern Furniture Exposition Building Assn.; erect \$450,000 building; cover 1 acre; 10 stories; W. T. Rose, Archt. and Contr.; J. D. Wilkins, contract at \$20,000 for ornamental iron; both Goldsboro, N. C. (Lately noted.)

Tex., Fort Worth.—Lumber Yard.—Wm. Cameron Co.; construct lumber yard, etc.; \$150,000; 200x200 ft.; 2 stories; concrete and hollow tile; ornamental terra-cotta; 4-ply built-up roof; cement and concrete floors; metal doors; wire glass; hot-air heat \$2000; city lighting; vault lights; steel sash and trim; ventilators; vaults; 4 hand-power elevators, \$1000 each; electric elevators \$7500; Chas. B. Allen, Archt.; B. F. & C. M. Davis Co., Contrs. (Lately noted.)

Tex., Waco.—Orphanage.—Methodist Orphanage, W. F. Barnett, Supt.; erect \$45,000 laundry and heating plant, first unit of \$150,000 Abe Mulkey Memorial Bldg.; 30x65 ft.; reinforced concrete; 3 boilers; memorial building to accommodate 150; 60x100 ft.; 2 stories and basement; assembly hall, library and music department, chapel, etc.; Milton W. Scott, Archt., 412½ Franklin St. (Previously noted.)

Railway Stations, Sheds, Etc.

Okla., Walters.—Chicago, Rock Island & Pacific R. R., 139 W. Van Buren St., Chicago; erect \$25,000 passenger depot; 1 story; 24x75 ft.; A. T. Hawk, Archt., and Engr., care owner; T. S. Leake & Co., Contrs., 608 S. Dearborn St., Chicago

Schools.

Ga., Atlanta.—Georgia School of Technology; erect 44x214-ft. addition to mechanical building; 2 stories and basement; first floor, machine shop; second, wood shop; basement, storage-room; brick walls, steel sash, steel roof trusses; slate roof; wood floors over reinforced concrete slabs; extend present foundry 40 ft.; truck entrance; heating and lighting from present plant; \$85,000; plans by Francis P. Smith, Dept. of Architecture at college. Address W. H. George, Contr., Builders' Exchange. (Lately noted.)

Mo., Cantwell.—Board of Education, Desloge, Mo.; erect \$75,000 high school; brick; stone trim; composition roof; R. H. Sanneman, Archt., Reserve Bank Bldg., Kansas City, Mo.; Geo. Gassman, Contr., Charleston, Mo. (Lately noted.)

Mo., Desloge.—Board of Education; erect \$25,000 building; brick; stone trim; composition roof; R. H. Sanneman, Archt., Reserve Bank Bldg., Kansas City, Mo.; Geo. Gassman, Contr., Charleston, Mo. (Lately noted.)

N. C., Greensboro.—State Building Comsn., Commercial Bank Bldg., Raleigh; erect dormitory, dining hall No. 3, pentagonal service portion, assembly pavilions with connecting corridors for North Carolina College for Women; Jas. A. Salter, State Archt., Raleigh; J. A. Jones Construction Co., Contr., Charlotte, N. C. (Lately noted.)

N. C., West Raleigh.—State Building Commission, Commercial Bank Bldg., Raleigh; erect 3 dormitories; W. B. Barrow, Contr., Raleigh; remodel Pullen Hall, J. E. Beaman, Contr., Raleigh; erect greenhouse; J. L. Crouse, Contr., Greensboro, N. C.; all structures at North Carolina State College of Agriculture & Engineering; Jas. A. Salter, State Archt., Raleigh. (Lately noted.)

Okla., Duncan.—Board of Education, C. T. Lawrence, Clk.; erect \$75,000 high school; Jewel Hicks, Archt., 19½ W. Main St., Oklahoma City; Manhattan Construction Co., Contr., Muskogee, Okla. (Lately noted.)

Okla., Grandfield.—Board of Education, M. F. Petterson, Clk.; erect \$75,000 high school; 2 stories and basement; Tonini & Bramblet, Archts., Terminal Bldg., Oklahoma City; W. E. Corlett, Contr., Vinita, Okla. (Lately noted.)

Va., Lexington.—Washington & Lee University; erect war memorial; brick and limestone; B. C. Flournoy, Archt., McLean Bldg., Washington, D. C.; M. B. Stoddard, Contr., Staunton, Va.

Stores.

Ark., Little Rock.—O. D. Tucker & Co.; erect 3-story building to replace lately noted burned structure; brick; terra-cotta front; hardwood floors; mezzanine floor; Jno. P. Almand, Archt. (Lately noted.)

Ark., Little Rock.—Beal-Burrow Realty Co.; erect \$200,000 building; 7 stories and basement; 70x170 ft.; fireproof; composition roof; maple floors over concrete slabs; steam heat; \$20,000; electric lights; prismatic vault lights, \$1000; 1 passenger and 2 freight elevators, \$20,000; Chas. L. Thompson, Archt.; Geo. W. Donaghey, Contr. (Lately noted.)

D. C., Washington.—Wm. T. Galliber, American Natl. Bank Bldg.; remodel business building, 1111-19 17th St.; 2 stories; 20x60 ft.; \$20,000; W. C. Brashears, Contr., 1219 Otis Pl. (Lately noted.)

La., Lafayette.—Paul Krauss; erect \$14,000 building; 2 stories; 32x60 ft.; first floor, stores; second, lodge room; brick; composition roof; tile floors; electric lights; G. R. Knapp, Archt.; J. A. VanDyke, Contr. (Lately noted.)

Okla., Oklahoma City.—Dr. J. B. Rolater; erect \$50,000 business building; 3 stories and basement; 50x140 ft.; J. W. Van Meter, Contr., 300 E. 11th St.

Theaters.

Va., Roanoke.—Geo. W. Payne; erect \$58,550 theater and store building; 2 stories; 50x160 ft.; brick, steel and wood; Barrett's roofing; E. G. Frye, Archt., McBain Bldg.; E. M. Herrington & Co., Contrs., Terry Bldg.; sub-contracts let.

W. Va., Wheeling.—Albert Schenk; erect \$150,000 motion-picture theater; 6 stories; 44x127 ft.; stone and tile; fireproof; seat 1200; Fred F. Faris, Archt.; R. R. Kitchen, Contr. (Lately noted.)

Warehouses.

Tex., Fort Worth.—Smith Bros. Grain Co.; erect 14 storage tanks to replace lately noted burned structures; 20 ft. in diameter; 100 ft. high; \$100,000; contract let.

Va., Richmond.—Wise Granite & Construction Co., American Bank Bldg., Contr. to erect \$140,000 warehouse, Hull and Brander Sts.; 3 stories; 70x220 ft.; Marcellus Wright, Archt., American Natl. Bank Bldg.; J. C. Roelker, Engr., Mutual Bank Bldg.

W. Va., Wheeling.—Globe Automatic Sprinkler Co.; erect \$115,000 addition; 123x261 ft.; Austin & Co., Contr., 1423 Euclid Ave., Cleveland, O.

MACHINERY, PROPOSALS AND SUPPLIES WANTED

Acetylene Torch.—Opdenweyer-Alcus Cypress Co., Sorrento, La.—Names and addresses mfrs. acetylene torch for felling and cutting cypress timber.

Aluminum Machinery.—Aluminum Honeycomb Co. of Texas, 1101 S. Flores St., San Antonio, Tex.—Names and addresses mfrs. aluminum-rolling machines.

Aluminum.—Aluminum Honeycomb Co. of Texas, 1101 S. Flores St., San Antonio, Tex.—Names and addresses mfrs. foil aluminum.

Bank Fixtures.—Farmers' Bank & Trust Co., W. B. Drake, Jr., Raleigh, N. C.—Prices on bank fixtures, safe and vault for bank.

Bank Fixtures.—Wm. A. Johnson, Prest. People's Federation Bank, Charleston, S. C. Prices on bank fixtures, safe and vault for bank.

Beams, etc.—Kaufman Metal Co., First and Clark Sts., Jacksonville, Fla.—I-beams and channels.

Blackboards.—M. C. Parker & Co., 306-07 D. H. Keene Bldg., Galveston, Tex.—Prices on blackboards for school.

Bobbins.—North State Cotton Mill Co., A. E. Watts, Secy.-Treas., Taylorsville, N. C.—Bobbins for 5040-spindle mill.

Boiler.—See Concrete Mixers, etc.

Boiler.—J. E. Lipscomb, 108 E. Court St., Greenville, S. C.—150 H. P. return-tubular boiler; 125 lbs. pressure.

Boilers.—Kaufman Metal Co., First and Clark Sts., Jacksonville, Fla.—Second-hand boilers.

Boilers.—Thos. W. Biddle, Archt., Cumberland, Md.—Data and prices on boilers for laundry.

Boilers.—Savannah River Lumber Co., R. G. Fulcher, Purchasing Agt., Savannah, Ga. Three 84x20 and 72-in. by 18-ft. horizontal return-tubular boilers, 150 lbs. working

pressure; prefer with Dutch ovens, steel casing.

Boiler.—See Dragline Equipment.

Brass Plates.—Bryant & Huffman, P. O. Box 419, Hillsboro, Tex.—Names and addresses mfrs. brass name plates for mounting in concrete bridges.

Breakwater.—City of Corpus Christi, Tex., Gordon Boone, Mayor.—Bids until April 15; construct rubble mound breakwater in Corpus Christi Bay; placing 100,000 tons riprap; R. J. Cummins, Const. Engr., 203 Stewart Bldg., Houston, Tex.; C. J. Howard, City Engr.

Brick Machinery.—N. V. Poindexter, Box 101, Elkins, N. C.—Names and addresses mfrs. of pressed cement brick mchy.

Brick Machinery.—John W. Pelot, Arcadia, Fla.—Names and addresses mfrs. cement brick mchy.

Bricks.—Rev. C. C. Matheny, Pastor Bap-

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ist Church, Lockhart, S. C.—Bids on bricks for church building, 50x110 ft.

Bridge Construction.—North Carolina State Highway Comsn., Div. Office, Raleigh, N. C. Bids until April 7; 3 concrete bridges and 5 concrete culverts in Nash County; 58,970 lbs. reinforced steel; plans, etc., on file; W. S. Fallis, Engr.

Bridge Construction.—Williamson County Commrs., F. D. Love, Judge, Georgetown, Tex.—Bids until April 13; bridge across Brushy Creek; 70-ft. steel truss span; concrete floor; three 22-ft. concrete slab spans on each approach; concrete piers and abutments; 33,000 lbs. structural steel; 33,500 lbs. reinforcing steel; plans, etc., with R. A. Nichols, Highway Engr., Georgetown, and State Highway Dept., Austin, Tex.

Bridge Construction.—Logan County Commissioners, Don Chafin, Clerk, Logan, W. Va.—Bids until April 19; bridge over Trace Fork of Island Creek; roads; plans, etc., with County Engr., Logan, and State Road Comsn., Charleston, W. Va.

Briquetting Machines.—J. B. Peddicord, 508 Gen. Taylor St., New Orleans, La.—Names and addresses mfrs. briquetting (Paris brick) machines; electric or steam-driven plant to mfr. cylinder charcoal bricks for laboratories and small heating appliances.

Building Material.—C. H. Phipps, Martinsville, Va.—Prices on building material for \$20,000 church building; 2 stories; 50x50 ft.

Building Material.—M. T. Chapman, V. P. Holdenville Home Construction Co., Holdenville, Okla.—Prices on building material, hardware, sashes, doors, etc.; carload lots.

Building Materials.—C. A. Spann, Prest.-Mgr. Spann Motor Co., Philadelphia, East and Ellwood Aves., Baltimore, Md.—Building materials for 150x170-ft. garage.

Calendars.—Farmers' Supply Store, O. O. W. Landgren, Collamoun, N. S. W., Australia. To represent calendar mfrs.

Cannery Equipment.—Rogerdale Farm, L. Manning Rogers, Ridgeville, S. C.—Names and addresses mfrs. cans, electric soldering mchy., pickle bottles, tubs and barrels.

Canning Machinery.—Rucks Yeager, Jr., Biloxi, Miss.—Names and addresses mfrs. canning mchy.

Cars.—Nixon-Smith Construction Co., 703 Bell Bldg., Montgomery, Ala.—Twenty-five 12-yd. 2-way standard-gauge dump cars, M. C. B.; prices f. o. b. cars De Ridder, La.

Caskets and Cases.—Director of Purchase, Room 1743, Munitions Bldg., Washington, D. C.—Bids until April 24 to furnish: 43,376 caskets and shipping cases, air and watertight; manufacturer's own design and specifications for wooden, metallic lined, metal or composition caskets considered; delivery desired, 7500 monthly, beginning July 1.

Castings.—John L. Harrington, care Amanda House, Bank and Main Sts., Winston-Salem, N. C.—100,000 lbs. light gray iron castings; as are used on threshing machines; lot of blacksmith work; 100 or more sets metal wheels and axles.

Charring Retorts.—W. B. Gregory, Tulane University of Louisiana, New Orleans, La.—Names and addresses mfrs. retorts for charring cotton and barley hulls, etc.

Chutes (Concrete).—See Concrete Mixers, etc.

Cleaning and Dyeing Equipment.—Owl Cleaning & Dyeing Co., P. L. Owen, Prest., Lufkin, Tex.—Cleaning and dyeing equipment.

Coal.—Mississippi River Dredging Dist., U. S. Dredge Depot, Dist. Engr., Box 1017, Memphis, Tenn.—Bids until April 26 to furnish 8000 tons coal in barges.

Concrete Mixers, etc.—Rust Engineering Co., District Bank Bldg., Washington, D. C. To rent with option of buying two ½-yd. concrete mixers, one ¼-yd. concrete mixer with double-drum steam-hoisting engine and boiler; 200 ft. concrete chutes.

Cotton Machinery.—John A. Bidwell, Beverly, N. J., and Chesapeake City, Md.—32-spindle cotton winder; heavy chain beamer, 80 to 90-in. wide, without friction drums.

Cupola.—Cherryville Foundry Works, C. C. Dellinger, Mgr., Cherryville, N. C.—Second-hand cupola, either 58 or 63-in. diam. shell.

Doors.—See Building Material.

Dragline Equipment.—W. S. Dickey Clay Mfg. Co., New York Life Bldg., Kansas City, Mo.—Second-hand dragline equipment, including boiler, engines, tower lines, 2-yd. buckets; to handle earth and rock 1000 ft. from tower; write or wire.

Drainage System.—West Bear Creek Commissioners, Covington, Ga.; R. L. Middlebrooks, Promoter, Starrsville, Ga.—Bids until April 17; construct 9 ml. ditch; 135,000 cu. yds. excavation; Will D. Alexander, Engr., Charlotte, N. C.

Dredge Buckets.—See Dragline Equipment.

Drills.—Junction Petroleum Co., M. W. Sells, Lawton, Okla.—Drills.

Drying Outfit.—Dr. W. B. Pickard, Nashville, Tenn.—Grain-drying outfit for mfg. health food.

Electrical Equipment.—C. A. Spann, Prest.-Mgr. Spann Motor Co., Philadelphia, East and Ellwood Aves., Baltimore, Md.—Electrical equipment.

Electrical Machinery.—Elton Warner, 150 Cumberland Ave., Asheville, N. C.—Small water-wheel and generator to charge storage batteries.

Electrical Machinery.—George H. Conner, 922 Sansom St., Philadelphia, Pa.—125 or 150 K. W. 125-volt D. C. direct-connected engine and generator set; good condition.

Electrical Machinery.—Pennsylvania Equipment Co., 1420 Chestnut St., Philadelphia, Pa.—Electrical equipment, including 2-speed slip-ring motor, 600 H. P. at 375 R. P. M., 400 H. P. at 210 R. P. M., 2200 volts, A. C., 25-cycle with starting equipment complete; 450 to 500 H. P. single-speed 25-cycle 3-phase 2200-volt motor; transformers for the above from 11,000 to 2300 volts. Quote price on similar equipment to be used as an alternate.

Electrical Machinery.—City of Laverne, Okla., Claude H. Arbuthnot, Supt.—2200-volt 12 to 15 K. V. A. motor; alternator; switchboard.

Electrical Supplies, etc.—Panama Canal, A. L. Flint, General Purchasing Officer, Washington, D. C.—Bids until April 22 to furnish: Copper cable; storage batteries; cable and bells; receptacle boxes; conduits; circular loom or conduits; cut-outs; conduit elbows; hard horn fiber; electrical fixtures; renewable fuses; lamp guards; electric water heaters; pipe-forcing jacks; blinker keys; sockets; switches, snatch and tackle blocks; copper ferrules; nails; horseshoes; harness; bridge leather; saddles; plate glass; automobile tires; canvas, rubber, metallic hose; lumber, etc. Blank forms and information (Circular 1359) on application to offices of: Panama Canal; Asst. Purchasing Agents at 24 State St., New York; 606 Common St., New Orleans; Fort Mason, San Francisco; United States Engr. offices throughout country.

Engines.—City of Laverne, Okla., Claude H. Arbuthnot, Supt.—100 H. P. oil engines.

Engines.—Kaufman Metal Co., First and Clark Sts., Jacksonville, Fla.—Second-hand engines.

Engines.—Thos. W. Biddle, Archt., Cumberland, Md.—Data and prices on engines for laundry.

Envelope Machinery.—Industrial Engineering Co., 12th and Monmouth Sts., Jersey City, N. J.—Data and prices on second-hand envelope-making machine.

Engines.—See Concrete Mixers, etc.

Engines.—See Dragline Equipment.

Evaporators.—W. B. Gregory, Tulane University of Louisiana, New Orleans, La.—Names and addresses mfrs. multiple type evaporators, resistant to alkali and acid.

Gas Plant.—Southern Public Utilities Co., Z. V. Taylor, Prest., Charlotte, N. C.—Water gas machines, pipe fittings, gas purifiers, meters.

Gins.—C. R. Fridge, care J. C. Barry & Co., 26 Dooley Bldg., Houston, Tex.—Names and addresses mfrs. moss gins and supplies.

Grinding Machinery.—W. B. Gregory, Tulane University of Louisiana, New Orleans, La.—Names and addresses mfrs. mchy. for grinding charred materials to powder.

Gravel Strippings, etc.—Union County Commrs. Road Improvement Dists. 1, 2, 3 and 4, El Dorado, Ark.—Bids until April 30; strip gravel pits, load road gravel from pits at point near Harrell, Ark., and unloading of same for storage for districts; Ford & MacCrea, Engrs. for Dists. 1 and 2; Carter & Knoch, Engrs. for Dist. No. 3; C. S. Christian, Engr. for Dist. No. 4.

Hardware.—See Building Material.

Heating Plant.—L. H. Stringer, Greenville, S. C.—Prices on heating plant for dwelling; 70x48 ft.

Heating Plant.—Neuman Bros., San Juan, Tex.—Hot-air heating plant for \$40,000 hotel; 123x84 ft.

Knitting Machinery.—W. T. McEwen, care McEwen & Bond, 204 Main St., Jackson, Tenn.—Names and addresses mfrs. small home knitting machines.

Laundry Supplies.—W. C. McCommons, Thomson, Ga.—Names and addresses mfrs. steam laundry supplies.

Laundry Equipment.—Thos. W. Biddle, Archt., Cumberland, Md.—Data and prices on laundry equipment.

Levee Construction.—Burleson County Levee Improvement Dist. No. 1, W. S. Mial, Chrmn. Board Supvrs., care John K. Parker, Bryan, Tex.—Bids until April 20; construct 5000-ft. levee; plans, etc., with J. C. Nagle, Dist. Engr., College Station, Tex.

Locomotive.—Egbert-Hancock Co., James Bldg., Chattanooga, Tenn.—50 to 60-ton 8-wheel rod locomotive; switching type; good condition.

Locomotive.—Long-Bell Co., Qultman, Miss.—80-ton Shay locomotive; less than 180 lbs. steam pressure; first-class operating condition; complete specifications, price and location.

Locomotives.—Nixon-Smith Construction Co., 703 Bell Bldg., Montgomery, Ala.—25 to 45-ton standard-gauge 10-wheel or Mogul locomotives, M. C. B., and 15 to 25-ton standard-gauge 10-wheel or saddle-tank locomotives, M. C. B.; prices f. o. b. De Ridder, La.

Lumber.—A. J. Grafts Piano Co., 220 N. Second St., Richmond, Va.—Dimension stock for piano and phonograph cases.

Machinery.—Kaufman Metal Co., First and Clark Sts., Jacksonville, Fla.—To represent mfrs. mchy. of all kinds and dealers in second-hand.

Machine Tools.—R. R. Harrell, 107 Grace St., Suffolk, Va.—Second-hand machine tools, including 30-in. by 14-ft., 18-in. by 12-ft. and 18-in. by 10-ft. engine lathes; 26-in. shaper, 6-ft. radial drill, No. ¼ or 2 milling machine.

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Machine Tools.—C. A. Spann, Prest.-Mgr. Spann Motor Co., Philadelphia, East and Ellwood Aves., Baltimore, Md. — Machine shop tools and supplies.

Mattress Machinery.—Liberty Machinery Co., L. B. Smith, Jr., Mgr., Liberty, N. C.—Bed mattress machinery.

Metalworking.—Jos. S. Click, Bridgewater, Va.—Names and addresses mfrs. dies, tools and general stamped work; relative to special contract.

Metalworking Equipment.—W. L. Cort, 32 Cooper Square, New York.—10-ft. power squaring shears to cut No. 10 gauge metal; 10-ft. power press or brake, capacity No. 10 soft steel.

Molds or Stamps.—Bryant & Huffman, P. O. Box 419, Hillsboro, Tex.—Names and addresses mfrs. molds or stamps for imprinting dates and names on concrete surfaces.

Motors.—R. R. Harrell, 107 Grace St., Suffolk, Va.—Two 3 H. P. General electric motors; second-hand.

Motors.—Haralson Sales Co., Jas. D. Haralson, Secy., 752 Brown-Marx Bldg., Birmingham, Ala.—Three 200 H. P. slip-ring or squirrel-cage 3-phase 60-cycle 2200-volt 1150 R. P. M. motors; very preferred.

Paving.—City, Dan Williams, Secy., Childress, Tex.—Bids until April 2; 30,000 sq. yds. street pavement; 40,000 sq. ft. sidewalk; 15,000 lin. ft. curb and gutter; plans, etc., with R. G. Carraway Co., Engr., Gainesville, Tex.

Oil Refinery.—Refinery Construction Co., 100½ Main St., Fort Worth, Tex.—Equipment for 3000-bbl. light oil refinery.

Overall Machines, etc.—T. L. McGowan, Box 599, Winston-Salem, N. C.—Names and addresses mfrs. overall and trousers machines and raw material.

Paving.—City, Steven Cranford, Clerk, Jasper, Ala.—Bids until April 16; 78,000 sq. yds. paving; 7500 sq. yds. alley paving; sheet asphalt, bitulithic, asphaltic concrete, brick or Portland cement concrete; 9500 cu. yds. grading; plans, etc., with Robert L. Totten, Conslt. Engr., Birmingham, Ala.

Paving.—City, W. T. Rainey, Clerk, Salisbury, N. C.—Bids until April 14; pave streets in Dists. 8, 9, 10, 11, 12 and 13; 28,950 sq. yds. bitulithic, sheet asphalt or concrete paving; 4300 sq. yds. bitulithic resurfacing over macadam; 21,250 lin. ft. granite curb; 4200 sq. yds. gutters; 335 ft. 12 to 24-in. sewers; plans, etc., with J. W. Webb, City Engr.

Paving.—Board of Awards, Baltimore, Md.—Bids until April 14; pave 30th St.; Walbrook, Parkwood, Shirley and other avenues; 15,800 sq. yds. sheet asphalt; 1900 sq. yds. vitrified brick gutters; 10,800 lin. ft. concrete curb; 8800 cu. yds. grading; specifications, etc., with Commrs. for Opening Streets.

Paving.—City, J. Loyal Gilbert, Mayor, Parkersburg, W. Va.—Bids until April 14; pave sections of 4 streets; 34,080 sq. yds. sheet asphalt, brick and concrete paving; 4000 lin. ft. concrete curbing; 2800 cu. yds. excavation; plans, etc., with L. G. Merrill, City Engr.

Pipe.—Pulaski Oil & Development Co., J. R. Poynter, Somerset, Ky.—Bids until April 15; 3 mi. 2 and 3-in. pipe; 1000 ft. 6¼ and 8¼-in. casings; delivered at Scottsville, Ky.

Pipe.—Southern Public Utilities Co., Z. V. Taylor, Prest., Charlotte, N. C.—Bids until May 1; lay 8 mi. 4 to 10-in. pipe.

Pile Driver.—Nixon-Smith Construction Co., 703 Bell Bldg., Montgomery, Ala.—3000-lb. pile driver or steam of equivalent power; prices f. o. b. cars De Ridder, La.

Piping.—Junction Petroleum Co., M. W. Sells, Lawton, Okla.—Piping and 2-in. water lines.

Piping.—United Pipe & Supply Co., Norristown, Pa.—Second-hand pipe; any quantity.

Piping.—Victor Oil & Gas Co., Paintsville, Ky.—6 and 8-in. piping.

Planing Mill.—Ideal American Corporation, Johnstown, Pa.—New or second-hand small planing outfit.

Press.—Pennsylvania Equipment Co., 1420 Chestnut St., Philadelphia, Pa.—Second-hand 2500 to 3000-ton capacity pure hydraulic press with close column spacing.

Rails.—H. T. Lambert Co., Huntington, W. Va.—Any size and quantity good relaying rails; quote price and location for inspection.

Rails.—Egbert-Hancock Co., James Bldg., Chattanooga, Tenn.—325 tons 75 or 80-lb. relaying rails with angle bars.

Road Construction.—Comms. Little Rock-Pulaski Road Improvement Dist. No. 10, B. Bodeman, Secy., Little Rock, Ark.—Bids until April 26; 55 mi. streets and roads in Sections 1 and 2, including Crystal Hill, Conway and Alexander roads; asphaltic concrete or warrentite paving on rolled stone or concrete base, plain concrete paving; culverts and bridges; plans, etc., with Comms. Little Rock, Lund & Hill, Engrs., 527 Southern Trust Bldg., and State Highway Comsn.

Road Construction.—Tennessee Department Highways, Nashville, Tenn.—Bids until April 23; 7.717 mi. State Highway No. 12 between Ripley and Tipton County line in Lauderdale County; 72,439 sq. yds. bituminous macadam or rock asphalt surface course; 72,439 sq. yds. broken stone or gravel base course; 46,520 cu. yds. excavation; bridges over 20-ft. span; plans, etc., on file at Nashville and with County Clerk at Ripley, Tenn.

Road Construction.—Raleigh County Commissioners, Jackson Smith, Beckley, W. Va.—Bids until April 26; grade and construct drainage structures on Logan turnpike; 19,000 cu. yds. excavation; 784 lin. ft. 12 to 24-in. pipe; 1500 lin. ft. tile drain; 3000 lbs. reinforcing steel; plans, etc., with C. B. Scott, Highway Engr.

Road Construction.—Logan County Commissioners, Don Chafin, Clerk, Logan, W. Va.—Bids until April 19; 2¼ mi. Monitor-Junction-Monerville road, Federal-aid Project No. 89; 12.4 mi. Logan to Man road; plans, etc., with County Engr., Logan, and State Road Comsn., Charleston, W. Va.

Road Construction.—Sanitary & Drainage Comsn. Charleston County, Charleston, S. C.—Bids until April 15; 7.384 mi. asphaltic concrete road on Charleston-Savannah Highway; 77,883 sq. yds. asphaltic concrete pavement; 46,773 cu. yds. earth excavation; bridges and culverts; plans, etc., on file at Charleston and with J. Roy Pennell, State Highway Engr., Columbia, S. C.

Road Construction.—Tennessee Department Highways, Nashville, Tenn.—Bids until April 23; 7.43 mi. State Highway No. 12 between Memphis and Mississippi State line; 104,600 cu. yds. bituminous macadam surface course; 102,073 sq. yds. reconstructed base course; cement concrete; bituminous concrete, rock asphalt or sheet asphalt surface course with binder as alternates for bituminous macadam; plans, etc., on file at Nashville and 12¼ Courthouse, Memphis, Tenn.

Road Construction.—North Carolina State Highway Comsn. Div. Office, Raleigh, N. C.—Bids until April 7; 6.02 mi. State Highway in Johnston County; Federal-aid Project No. 58; 14,667 cu. yds. topsoil surfacing; 27,000 cu. yds. excavation; bridges and culverts; plans, etc., on file; W. S. Fallis, State Highway Engr.

Road Construction.—North Carolina State Highway Comsn. Div. Office, Raleigh, N. C.—Bids until April 7; 11.32 mi. State Highway in Duplin County; Federal-aid Project No. 103; 27,800 cu. yds. topsoil surfacing; 35,069 cu. yds. excavation; bridges and culverts;

37,390 lbs. reinforcing steel; plans, etc., on file; W. S. Fallis, State Highway Engr.

Road Construction.—North Carolina State Highway Comsn. Div. Office, Raleigh, N. C.—Bids until April 7; 7.03 mi. State Highway in Columbus County; Federal-aid Project No. 75; 20,683 cu. yds. topsoil surfacing; 37,286 cu. yds. excavation; bridges and culverts; plans, etc., on file; W. S. Fallis, State Highway Engr.

Road Construction.—De Kalb County Commr. Roads and Revenues, L. T. Y. Nash, Commr., Decatur, Ga.—Bids until April 22; improve roads; 17,493 cu. yds. grading; 38,380 sq. yds. paving; gutters; curbs, etc.; plans, etc., with Commr., Clerk and E. V. Camp, Engr., Box 421, Atlanta, Ga.

Road Rollers.—Nixon-Smith Construction Co., 703 Bell Bldg., Montgomery, Ala.—One or two 5 to 10-ton steam or gasoline road rollers; prices f. o. b. cars De Ridder, La.

Safe.—See Bank Fixtures.

Safe.—C. A. Hood, Prest. Perry Building Assn., Perry, Fla.—Prices on safe.

Sawmill.—P. M. Jackson, Box 100, Chidester, Ark.—Sawmill, appliances, etc.

Sewer Construction.—Town of Potomac, Va., J. W. Varney, Mayor.—Bids until April 27; construct sanitary sewers; lay sewer pipes; excavate 30,000 cu. yds. trench; construct 36,000 lin. ft. 8-in. sewers; 5100 lin. ft. 10 to 12-in. 700 8x6-in. Y branch house connections; 85 manholes; plans, etc., from David J. Howell & Son, Engrs., Union Trust Bldg., Washington, D. C.

Sewing Machines.—John A. Budwell, Beverly, N. J., and Chesapeake City, Md.—2 or 3 overlock sewing machines No. 81-1-2-3-4; 8-head power table with shafting, pulleys and transmitters.

Shear.—Pennsylvania Equipment Co., 1420 Chestnut St., Philadelphia, Pa.—Shear to cut 1¼x30-in. cold steel, with 36-in. cut.

Shoe-repair Supplies.—H. W. Blanks, Cangelosi Bldg., Baton Rouge, La.—Names and addresses dealers in shoe-repair supplies, including leather.

Shovel.—Nixon-Smith Construction Co., 703 Bell Bldg., Montgomery, Ala.—¾-yd. caterpillar steam shovel; prices f. o. b. cars De Ridder, La.

Spools.—North State Cotton Mill Co., A. E. Watts, Secy.-Treas., Taylorsville, N. C.—Spools for 5040-spindle mill.

Springs.—Carolina Machinery Co., Sumter, S. C.—Names and addresses mfrs. truck and automobile springs.

Steel Sash.—Thos. W. Biddle, Archt., Cumberland, Md.—Data and prices on steel sash for 284x130-ft. laundry building.

Steel Springs.—John L. Harrington, care Amanda House, Bank and Main Sts., Winston-Salem, N. C.—20,000 steel springs; has sketch.

Transmission Machinery.—P. M. Jackson, Box 100, Chidester, Ark.—Power transmission machinery.

Vault.—See Bank Fixtures.

Woodworking Machine.—W. S. King Co., Earle, Ark.—New or second-hand small universal woodworking machine; with motor or engine.

Woodworking Machinery.—Toccoa Furniture Co., W. C. Edwards, Prest., Toccoa, Ga. Woodworking mchy., including double-end tenoner, triple-drum sander, hollow chisel mortiser, continuous feed glue jointer, double-spindle shaper, band resaw, inside molder, pony planer, self-feed rip saw, hand jointer, etc.

Woodworking Machinery.—Sherwood Lumber & Mfg. Co., Barnwell, S. C.—Woodworking mchy., including heading, stave, crate and lath machine; good condition.

Wheels and Axles.—John L. Harrington, care Amanda House, Winston-Salem, N. C.—100 or more sets metal wheels and axles.

Railroad Construction

Railways.

Ky. Winchester.—Red Oak Lumber Co. of Winchester will build narrow-gauge railroad to develop timber lands on Carr's Fork of Kentucky River. Wm. J. McLeomore, Pres.; R. L. McLeomore, V.-P. and Gen. Mgr.; R. D. Baker, Secy. and Treas.

La. Shreveport.—Missouri, Kansas & Texas Railway proposes to rebuild its line from Shreveport, La., to Hughes Springs, Tex., about 75 mi., laying heavier rails and recasting the track. E. L. Martin is Ch. Engr. at Dallas, Tex.

N. C. Clinton.—The committee appointed to promote plans for a railroad from Raleigh via Dunn and Clinton to Wilmington, N. C., 115 mi., is organized, with Major George Butler, Secy. Proposed capitalization of company \$600,000.

Tex. Anahuac.—Capt. W. E. Tyrell of Beaumont, Tex., and H. W. Dew of Dew Bros. Rice Co., Houston, Tex., are reported working on plan to build a railroad from Nome to Anahuac, about 25 mi.

Tex., Dallas.—Voters of Dallas will decide

at election Apr. 6 on proposition of J. F. Strickland, president Dallas Railway Co., to build line to Wichita Falls, Tex., and the oil fields, 130 mi., instead of two 30-mi. inter-urban lines promised under existing franchise.

Tex., Fort Worth.—St. Louis Southwestern Rwy. contemplates considerable construction of industrial tracks at Fort Worth. A. A. Matthews is Ch. Engr. at Tyler, Tex.

Va., Covington.—Freehold Lumber Co. is building a standard-gauge railroad from Kincaid, on the Hot Springs Branch of the Chesapeake & Ohio Rwy., up Jackson River and through Bolar's Draft to Mountain Grove to develop timber lands. A. Rex Flinn and others of Pittsburgh, Pa., and T. M. Gathright of Covington, Va., are interested.

W. Va., Rainelle.—Steel has been bought and construction is being pushed on construction of the Greenbrier & Eastern R. R., to be 10½ mi. long from Rainelle, on Sewell Valley R. R., to head of Meadow River. Boxley Bros., Rainelle, have the contract. John B. Laing, Lewisburg, W. Va., is Pres.; W. S. Woods, Charleston, W. Va., V.-P.; J. Wade Bell, Bellwood, W. Va., Treas. and Secy.; Hal M. Scott, Rainelle, Gen. Mgr. and Ch. Engr.

similar to that described above. Cost was about 40 cents per linear yard.

Couplings for High-Pressure Lines.

Captain D. Souter of Baton Rouge, La., has invented and patented an improved high-pressure flange pipe coupling for use on large sized pipe, hose and flexible steam hose—both steam and fluid lines—that have to be frequently connected and disconnected and which are subjected to high pressure. This coupling has its entire flange surface for gasket or packing, as there are no bolt holes or through bolts, and the gasket, it is stated, cannot split or blow out after the coupling is assembled. The coupling is simple and may be easily and quickly assembled or disassembled; it is also almost rigid when put together and takes care of expansion and contraction. The invention is designed to meet a long-felt want for a coupling that is leak-proof and convenient. It is suited for oil well pipe, oil pipe lines and other lines conveying fluids, as well as for steam lines. It may be assembled or disassembled with an ordinary wrench. The coupling can be made to suit working conditions, and it can be manufactured of either malleable or cast-iron or of cast-steel.

Efficient Use of Fuel Oil.

Charles C. Phelps recently became associated with the Uehling Instrument Co., 71 Broadway, New York, combustion engineers, as well as manufacturers of CO₂ recording equipment and other fuel economy apparatus. He is devoting most of his attention to research work concerning the efficient combustion of fuel oil in boiler furnaces. It is estimated that nearly \$100,000,000 is wasted every year due to improper methods of burning fuel oil. Mr. Phelps graduated from Stevens Institute of Technology as a mechanical engineer, and has spent several years studying power-plant problems. For five years he was with the Ingersoll-Rand Company.

Collection and Disposal of Garbage, Etc.

F. C. Bamman, formerly chief of the Garbage Utilization Division of the United States Food Administration, has resumed the practice of his profession as consulting engineer, with offices at 206 Woodward Bldg., Washington. D. C. Mr. Bamman graduated from Princeton University in 1910 with the degree of civil engineer, and went to Labrador on a large wood-pulp proposition. In June, 1911, he became engineer assistant to the superintendent of street cleaning at Washington, J. W. Paxton, and remained with that department until October, 1917, when he left to help organize the Garbage Utilization Division. During the last three years of his connection with the street-cleaning department Mr. Bamman devoted his time practically to the collection of the city wastes and their disposal, doing also considerable consulting work, in particular work on street cleaning for the city administration in Philadelphia when Rudolph Blankenberg was Mayor. The department at Washington became highly developed during those years and was favorably remarked in engineering publications. When with the Food Administration Mr. Bamman's work comprised instruction to city officials and the general public as to the needs of garbage utilization, and he was called upon to advise in many localities and concerning a variety of problems, with the result that large amounts of material previously wasted were saved. He now continues to specialize in waste-material subjects, his work being largely with private companies. For instance, he has been the engineer for the American Feeding Company, which disposes of the garbage in Baltimore. Mr. Bamman has thus added 10 years of ap-

INDUSTRIAL NEWS OF INTEREST

Items of news about industrial, railroad or financial interests, building operations, construction work, municipal improvements, or the sale of machinery or the letting of contracts in the South or Southwest, are invited from our readers whether they are advertisers or subscribers or not. We invite information of this character from readers in the North and West about their Southern business operations, as well as from Southern readers. News of value will be published just as readily when from non-advertisers as from advertisers.

Improvement in Road Construction.

C. M. Wood, formerly sales engineer for the H. W. Johns-Manville Company and a man of wide experience in road engineering and highway construction, has assumed charge of the recently established good-roads bureau of the Goodyear Tire & Rubber Co. of Akron, Ohio, and will devote his entire time to its work throughout the United States. Mr. Wood is a native of Texas and a graduate of Cornell University as a mechanical engineer. He followed engineering work for eight years, then for two and a half years was engaged in sales engineering for a Chicago cement company. He was also at one time department manager for the Portland Cement Association. In the same spirit which prompted the Goodyear company to go to the aid of the Lincoln Highway when help was sorely needed, its good-roads bureau has been established under Mr. Wood's management. It is to work for the promotion of good roads, paying especial attention to seeing that hard-surfaced roads are so constructed that they will be adequate for the needs of transportation in future years, that they are wide enough for trucks to pass without getting off the hard surface, that there is proper road drainage, and that foundations are laid correctly. Recently Mr. Wood has been in conference with E. B. Smith, testing engineer of the Bureau of Public Roads, Washington, and they will endeavor to determine the destructive effects of impact forces upon road surfaces, and to ascertain proper road surfaces, type of construction and foundation best suited to withstand such impacts and to increase road durability. Machinery testing is now under construction.

Announces Change of Business.

The Baker R. & L. Company, Cleveland, Ohio, announce an expansion of their business which will allow for greater production of Baker industrial trucks and Raulang bodies. The change includes the sale of the electric passenger-car business to Rauch & Lang, Inc., Chicopee Falls, Mass. The manufacturing space made available will result this year in

tripling the industrial truck output and doubling the body production. E. J. Bartlett, general manager, says: "We believe in an extraordinary future for the industrial truck, and our new policy will permit of necessary expansion." This company began business over 60 years ago as coach builders, and later have been prominently identified with the electric-vehicle industry. Fifteen years ago they attracted much attention with an electric racing car that established a record.

Southern Reclamation Costs.

The land clearing and drainage movement in Southern States is very active at present. Not only is considerable work being done, but much more is being contemplated. Cost figures on such work recently done are therefore of great interest to owners of stump and wet land. Below are given some figures furnished by E. I. du Pont de Nemours & Co., Wilmington, Del.: J. L. Wade, Dunn, N. C., clearing 150 acres of stump land with 40 per cent ammonia, dynamite and electric-blasting caps, found that the cost, including labor, approximated 50 cents per stump. Capt. L. M. Fisher, Sanitary Engineer, U. S. A., engaged in mosquito control work at Bamberg, S. C., drained a swamp by blasting a ditch with dynamite. It was ten feet wide and about five feet deep. The soil was stiff black mud, underlaid with sand. A pound and a half of straight nitroglycerin, 50 per cent dynamite, was loaded per hole. Holes in single line, 30 to 36 inches apart and 42 inches deep. Fired electrically. Cost 49 cents per linear yard. To drain wet land on his farm at Whiteville, N. C., Register of Deeds Bolden of Columbus County blasted a ditch ten feet wide and four feet deep through loam underlaid with compact white sand. The method employed was approximately the same as on Captain Fisher's job. Cost was 47 cents per linear yard. Also to drain wet land on his farm at Blenheim, S. C., Dr. C. D. Napier had blasted for him a ditch eight feet wide and three feet deep through stiff clay soil. Method was very

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piled study in waste-disposal theory and practice to a general engineering education, and has written and published a number of articles on various phases of the problems met and solved.

Improved Selling Organization.

The Barber-Greene Company, manufacturers of belt conveyors, bucket loaders, etc., Aurora, Ill., have found it necessary, owing to the greatly increased demand for their self-feeding loaders and standardized conveyors, to make some additions to and changes in their selling organization. They are now represented in St. Louis by R. E. Foulke, 404 Third National Bank Bldg.; in Pittsburgh by J. A. Gurney, 605-606 Arrott Bldg.; in Philadelphia by F. A. Sawyer, 1010 Penn Square Bldg., and in Indianapolis by W. T. MacDonald, 305 Merchants' Bank Bldg. These offices are direct branches of the company and the representatives are experienced engineers qualified to give true service and engineering advice.

New York Office in New Quarters.

The Hyatt Roller Bearing Co. announce that they have moved their offices in New York City in order to secure much larger quarters, and are now located on Sixth Ave. at 41st St., which is one block east of Broadway and one block west of Fifth Ave., being also the same distance south of 42d St., so that the new place is very conveniently situated. The telephone address is Bryant 5900.

Zinc Soldering Information.

Practical information on soldering zinc has just been compiled by the New Jersey Zinc Co., 160 Front St., New York. It embodies several details that the metal artisan will undoubtedly find of value in this work. These hints have been prepared by the company's rolled zinc division to satisfy numerous requests for information on this subject. Those who desire a copy may secure one by writing the sales department of that concern.

Officers Elected.

At the annual meeting of the Burton-Townsend Company, Zanesville, O., officers for the ensuing year were elected as follows: Rufus C. Burton, chairman board of directors; Fred M. Sayre, president; William H. Lucktenberg, vice-president and general manager; L. K. Brown, vice-president; Leo W. Fleming, secretary and treasurer. This company has three plants for paving, face and radial chimney brick, also five molding sand mills and coal mines. General offices are at Zanesville.

Another Paterson Product.

The completion and shipment of a machine for sharpening well drills is just reported from the Wood Drill Works, Dale Ave., Paterson, N. J., and in this connection it is remarked that heretofore it has been customary for well drills to be sharpened by ordinary blacksmithing methods, using a sledge hammer and requiring a long time to do the work. Now, it is stated that this machine will sharpen a drill in about five minutes, making a clean, neat and true job. The new machine is to be used near the Bethlehem Steel Works, and it is anticipated that it will do much to speed up work in connection with the rapid and greater production of oil.

Sales Engineers Appointed.

After several years' service in the estimating and sales departments of the Whiting Foundry Equipment Co., at the main office, Harvey, Ill., C. H. Martin and Gustav Schirmer have been transferred respectively to the company's Pittsburgh and Detroit

offices to take up the duties of sales engineers. Both are experienced engineers and thoroughly familiar with the design and construction of cranes and foundry equipment.

Representative Appointed.

W. R. Cunnick has been appointed special representative of the Falcon Steel Co. of Niles, O., in charge of Eastern territory.

Special Engineering.

Hess & Skinner, civil engineers, announce in a circular special practice in sanitary and municipal engineering, including streets, pavements, sewers, sewage treatment, bridges, buildings, tanks, towers, hydraulic engineering, drainage and flood protection, topographical engineering, reports on engineering projects, interpretation of plans and specifications, also preliminary investigations, estimates, advice as to materials, etc. The main offices of the firm are in the Southwestern Life Insurance Bldg., Dallas, Tex., and they also have district offices in Amarillo, Tex.; Little Rock, Ark.; Atlanta, Ga.; Raleigh, N. C., and Texarkana, Tex.-Ark. Frederick E. Hess and Phillip M. Skinner are consulting engineers; George E. Morrison, chief engineer; James E. Burger, supervising engineer.

Change of Location.

The Weller Manufacturing Co., Chicago, Ill., are now represented in the Southeastern States by H. Deverell, 1401 Lexington Bldg., Baltimore, Md. Mr. Deverell was formerly head of the firm of Deverell, Spencer & Co. He is, it is stated, a competent engineer and well equipped to take care of any elevating, conveying or power transmitting problems. The Baltimore office was formerly in the Garrett Bldg.

Now Have Six Branches.

The Victor L. Phillips Company of Kansas City, Mo., doing a general business in transportation and construction equipment, recently purchased the business and good will of Wiley Bros. of Oklahoma City, who are well known throughout the Oklahoma territory, having conducted a large and profitable business there in contractors' machinery for some years, their location being 208 E. Grand Ave., Oklahoma City. The Phillips Company will continue the business and also add many different lines of construction machinery, this business being under the direct supervision of W. R. Wilson, assisted by J. M. Marks and A. F. Luder. In addition to the new branch the Phillips Company have branches at Salina, Wichita, Joplin, Little Rock and Tulsa.

Removal.

The manufacturing sales department of the Wellman-Seaver-Morgan Company has been moved from the Akron office to the general offices at 7000 Central Ave., Cleveland, Ohio.

Engineering.

Charles T. Mann, Boston, Mass., announces that his organization is enlarged and better prepared to undertake engineering work for all kinds of industries, storage and terminal facilities, water-power and steam-power developments, examination and reports on plants as to value, reorganization or development. Col. F. M. Gunby, who was associated with Mr. Mann's office for 15 years before the war, when he became head of the engineering branch of the constructing division of the U. S. Army, has now returned and has been appointed engineering manager.

Floor and Wall Tile in Demand.

J. E. Hunnicutt, manager of the Southern Mosaic Tile Co., Candler Bldg., Atlanta, Ga., during a successful trip through the West and Southwest recently, found general business activity prevailing, construction of all buildings was being pushed as fast as material could be obtained, labor was plentiful, and nowhere were there any labor trouble. At several cities in Arkansas and Texas open-shop conditions prevailed successfully. The company, being in position to make prompt shipments of floor and wall tile and interior marble, booked orders for some 23 carloads of their products in several States, as follows: Tennessee, 3 cars; Arkansas, 1; Texas, 10; Kansas, 1; Colorado, 2; Louisiana, 1; Mississippi, 1, and Alabama, 4 cars. During the last 10 months the company has received orders totaling more than 5,000,000 pounds of tile.

Ice Machines of All Sizes.

The Simplex Ice Machine Co. has nearly completed its new plant at Fort Worth, Tex., the building having 26,000 feet of floor space. It has a frontage of 550 feet, but the whole property has a frontage of 1759 feet. Construction is of brick and concrete, with a concrete roof. It is absolutely fireproof. This new plant will have a capacity of 115 machines per day. It would have been finished in February but for unusually severe winter conditions. Besides being fully equipped for manufacturing, the building also contains many comforts and conveniences for the use of employees, including lavatories with shower baths, kitchen, dining-room, restroom, recreation-room, etc. The company makes three types of ice machines, viz., No. 1 (the farmer type), of 350 pounds capacity daily or its equivalent in refrigeration; No. 2, the country grocery or dairy size, with a rating of 1000 pounds daily, and the No. 3 or duplex type, which is designed for heavy work, as for large butcher shops, markets, etc.; it has a rating of 2000 to 3000 pounds of refrigeration per day. Besides, the manufacture of larger plants for packing houses, etc., can now be undertaken. The machinery in the factory is driven by electricity and is of the latest design. Cost of manufacture will be reduced as a result of this enlargement. Moreover, the machines have been improved by making them more compact and by increasing their efficiency. In this new plant the company will also be able to make all kinds of pipefittings for the ammonia trade, and it is being equipped with a complete acetylene welding outfit.

Successful Equipment of Huge Elevator.

The new Canton grain elevator of the Pennsylvania Railroad at Baltimore, which has a capacity of over 4,297,000 bushels, and began operations recently with a successful testing out of the machinery and a trial with a large amount of grain, is equipped throughout with elevator and conveyor belting made by the B. F. Goodrich Rubber Co. of Akron, Ohio. This represents the largest single order of belting ever shipped, and it required seven boxcars to transport it from Akron to Baltimore. The belting totaled 44,254 feet, approximately $8\frac{1}{2}$ miles, and weighed 131 tons. The capacity of one of the 48-inch horizontal carrier belts is 350,000 bushels in a 10-hour day. Accommodations are provided for the loading of five ocean liners at once, and with the new apparatus for loading that has been installed the ships can be loaded within 10 hours. In conjunction with the facilities that have been made for handling ship cargo, the latest device for the unloading of grain railroad cars has also been put into operation.

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

New Name in Oxy-Acetylene Field.

The Oxweld Acetylene Co. of Newark, N. J., and Chicago has recently extended its manufacture of oxy-acetylene apparatus and equipment to include "Eveready" welding and cutting outfits. While the name is new, the apparatus is not, excepting for certain refinements of design, having been used extensively in the metal-working trades for several years under the name of "Prest-O-Lite." The new name was adopted as being more pertinent. The apparatus is designed for use exclusively with compressed acetylene in cylinders, thus providing the welder and cutter a compact and complete portable outfit.

OBITUARY.

John Jeppson.

John Jeppson, superintendent and one of the founders of the Norton Company, Worcester, Mass., and also a pioneer Swedish resident of that city, died March 26 at the Plaza Hotel, Havana, Cuba, where he had gone for a vacation. Mr. Jeppson was 75 years of age. He came to this country when 25 years old and settled at Worcester. Since 1880 he had been connected with the Norton Company's business, in which he became a partner in 1884. Mrs. Jeppson and his son, George N. Jeppson, who is works manager of the company, survive him. Mr. Jeppson was a 32d degree Mason, and, besides being prominent in that order, was also a leader among people of Swedish descent in the United States.

Financial News

New Financial Corporations.

Ark., Blytheville.—First National Bank, capital \$100,000, surplus \$10,000, is chartered. Began business Mch. 29. Clinton Fraser, Prest.; T. B. Ricks, V.-P.; L. N. Mathis, Cash.

Ark., Oden.—Bank of Oden, capital \$10,000, surplus \$1000, is chartered; S. W. Duke, Prest.; A. J. Plemmons and I. C. Chapman, V.-Ps.; Carle Robbins, Secy. and Cash.

Fla., Homestead.—Citizens' Bank, capital stock \$25,000, is organized; A. C. Graw, Prest.; Wm. J. Carter and S. A. King, V.-Ps.; E. N. Gause, Cash.

Fla., Perry.—Perry Building Association, capital \$5000, is chartered. Began business Apr. 1. C. A. Hood, Prest.; W. M. Herd, V.-P.; I. A. Nesbit, Secy.; Fess Croom, Treas.

Ga., Columbus.—First Natl. Bank of Columbus is the new name adopted for the Natl. Bank of Columbus, officers the same.

Ky., Hebron.—Hebron Deposit Bank, capital \$20,000, is chartered; incorporators, Wm. Goodridge, Clinton Riddell, John W. Grant and J. C. Clare.

Ky., Lewisport.—Bank of Lewisport, capital \$15,000, is incorporated. Incorporators: S. T. McGill, Ada McGill, J. W. Hayden and others.

La., Alexandria.—Alexandria Bank & Trust Co., capital \$300,000, is chartered to begin business Apr. 15. J. E. McAdams, Prest.; V. V. Lambin, V.-P. and Cash.

La., Bossier City.—A bank with paid-in capital of \$15,000 is being organized; T. R. Wilkinson, Prest.; H. A. Dillard, V.-P.; N. W. Hutchings, Cash.

La., Monroe.—Louisiana Savings Bank & Trust Co., capital \$300,000, is organized to begin business immediately; A. Collman, Prest.; H. N. Thompson, V.-P. and Cash.

Miss., Carthage.—A new bank with capitalization of probably \$30,000 is being organized. Chamber of Commerce may be able to give information.

Miss., Lauderdale.—Lauderdale State Bank, capital stock \$12,000, is incorporated. Will begin business about May 1. T. H. Naylor, Willard E. Brown, T. C. Lyle, Jr., and others.

Miss., Sebastopol.—A new bank with capital of \$10,000 and surplus of \$2000 has begun business. W. A. Hataway Prest.; D. S. Stewart, V.-P.; B. F. Underwood, Cashier.

N. C., Wallace.—Farmers' Bank & Trust Co., capital \$50,000, is incorporated to begin business May 1. G. B. D. Parker, Prest.; R. B. Drake of Raleigh and W. T. Crump, V.-Ps.; O. P. Banks, Cashier.

Okla., Depew.—Depew Natl. Bank, capital \$25,000, is chartered; C. N. Lee, Prest.; H. R. Corey, Cash.

Okla., Okmulgee.—American State Bank, capital \$200,000, surplus \$20,000, is chartered to begin business about Apr. 15. A. J. Peters, Prest.; Tom King, W. C. Newman and T. C. Johnston, V.-P.; W. E. Wilson, Cash.

S. C., Charleston.—Peoples' Federation Bank, capital \$25,000, is chartered. Will begin business about June 30. W. H. Johnson, Prest.; J. E. Beard and A. J. Clement, V.-Ps.; L. R. Izzard, Secy. and Eugene Gadsden, Treas.

S. C., Fork.—Bank of Fork, capital stock \$15,000, is chartered; F. Chalmers Rogers, Prest.; K. S. Carmichael, V.-P.; M. E. Carmichael, Cash.

S. C., Leesville.—Merchants and Farmers' Bank, capital \$50,000, is organizing; Dr. D. M. Crosson, J. C. Swygert, Wm. M. Oxner and others are directors.

Tex., Brownwood.—Brownwood Building and Loan Assn., capital \$50,000, subscribed, is being organized by Chester Harrison, Brooke Ramey, A. P. Bratton, W. D. McCulley and V. Davis.

Tex., Elkhart.—Farmers and Merchants' State Bank, capital stock \$30,000, is chartered. Tucker Royall, Prest.; Alpheus Hanks, Cash.

Tex., Fort Worth.—United Trust Co., capital stock \$1,000,000, has been organized. Robt. H. Aiken, Prest.; J. C. Houser, P. P. Pierce, Ben. S. Graham, W. S. McMurray and J. W. Benson, V.-Ps.; R. L. Ray, Secy., and J. M. Edwards, Treas.

Tex., Houston.—Central and Magnolia Park State Bank, capital \$20,000, has applied for charter. Will F. Humphrey, Prest.; J. A. Elkins, V.-P., and Fred Humphrey, Cash.

Tex., Necessity.—First Natl. Bank, capital \$25,000, is chartered; J. P. Crowley, Prest.; C. A. Smith, Cash.

Tex., Sylvester.—First State Bank, capital \$50,000, surplus \$2500, is incorporated to begin business April 6. Cap. Newman, Prest., and V. B. Carothers, Cashier.

Tex., Wichita Falls.—Security National Bank, capital \$300,000, is organized. J. I. Staley, Prest.; C. C. Cabiness, V.-P. They will occupy the quarters vacated by the City National Bank upon their removal to the new City National Bank Bldg.

Tex., Wichita Falls.—The City National Bank and the National Bank of Commerce, which have been merged under the name of the City National Bank of Commerce, will move their quarters to the new City National Bank Bldg., a 12-story structure. The combined deposits of the banks are close to \$20,000,000. Capital \$1,000,000, surplus \$700,000. J. A. Kemp is president; the vice-presidents are C. W. Snider, C. W. Reid, P. P. Langford, W. L. Robertson, C. E. Basham. R. E. Shepherd is the cashier.

Va., Big Stone Gap.—First Natl. Bank,

capital \$25,000, has applied for charter; J. R. Taylor and others.

Va., Richmond.—Second Street Savings Bank, maximum capital \$50,000, minimum \$10,000, is chartered. Jno. T. Taylor, Prest.; W. S. Banks, Secy., and J. J. Carter, incorporators.

Va., Tappahannock.—Southside Bank incorporated; has filed amendment to charter to change name to Southside Bank and increase capital stock from \$25,000 to \$50,000. Jas. M. Lewis is Prest., and A. A. Cralle, Secy.

Va., Vienna.—Vienna Natl. Bank, capital \$25,000, has applied for charter; B. F. A. Myers and others.

W. Va., Bayard.—Bayard Natl. Bank, capital \$25,000, is chartered; M. Tamburini, Prest.; Irvin L. Neville, Cash.

W. Va., Hurricane.—Hurricane Natl. Bank, capital \$50,000, is chartered; J. S. Burdette, Prest.; L. D. Carter, Cash.

New Securities.

Ala., Birmingham.—(Auditorium, Fire Apparatus).—Sold to R. M. Grant & Co. of New York, at par and premium of \$500, \$500,000 of 5 per cent auditorium bonds and \$100,000 of fire-department-vehicle bonds, and to the Gamewell Fire Alarm Telegraph Co., at par and interest, \$275,000 of 5 per cent fire-alarm bonds, all 10-year bonds and offered on Mch. 30. N. A. Barrett is Prest. City Comsn.

Ala., Tuscaloosa.—(Hospital).—Election Apr. 13 on \$50,000 of 5 per cent 30-year bonds. Address D. B. Robertson, Prest. Board of Commrs. J. V. Jones is City Clerk.

Ark., Mena.—(Road).—Sold to Gunter & Co. of Little Rock at 97½, \$125,000 of Road Improvement Dist. No. 5, Polk County, bonds.

Ark., Mountain View.—(Road).—Sold to M. W. Elkins of Little Rock \$80,000 bonds of Road Improvement Dist. No. 3 of Stone County. N. C. Maxey, Timbo, Ark., is Prest. Dist. No. 3 Road Commrs.

Fla., South Jacksonville.—(Improvement).—\$190,000 of 6 per cent \$1000 denomination 30-year city bonds were voted Mch. 16. R. M. Rogero is City Clk.

Ga., Adel.—(Light Plant).—Election Apr. 14 on \$12,000 of town bonds. Address The Mayor.

Ga., Decatur.—(School).—Contemplated to hold an election to vote on \$125,000 of bonds. Address School Board.

Ga., Duluth.—(School).—Election called for Mch. 27 on \$10,000 of 6 per cent \$500 denomination serial School Dist. bonds was postponed. Date to be announced later. Address Heard Summerour, Secy. School Board.

Ga., Jackson.—(School).—Contemplated to vote on bonds for school improvements. Address School Board.

Ga., Jackson.—(Road).—An election is contemplated to vote on Butts County bonds. Address J. O. Gaston, County Commr.

Ga., Kirkwood.—(School).—Election May 1 on \$55,000 of bonds. Address School Board.

Ga., Moultrie.—(Paving, Sewer, School).—The \$105,000 of 5 per cent \$1000 denomination city bonds offered Mch. 25 have been sold at \$105.729, as follows: \$60,000 paving, \$10,000 sewer and \$25,000 school. City provides bonds and pays attorney's fees. J. S. Johnson is Mayor and J. H. Scarborough, City Clerk.

Ga., Savannah.—(School).—Special dispatch to Manufacturers Record says that \$500,000 of 4½ per cent serial 30-year Chatham County bonds, dated Dec. 1, 1919, voted Oct. 7, 1919, and offered Mch. 29, 1920, were sold to the Hibernia Bank of Savannah at .93679. Oliver T. Bacon is Chrmn.

Ky., Harlan.—(Road and Bridge).—Bids will

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

be received until Apr. 15 for \$160,000 of 5 per cent, not exceeding 30-year, \$500 and \$1000 denomination, Harlan County bonds voted Nov. 4, 1919, and dated June 1, 1920. Address Nelson Cory, County Road Engr.

La., Clinton—(School).—Sold to E. A. Gessler of St. Louis at 97.50, \$10,000 of 5 per cent 1-10-year serial \$1000 denomination bonds of East Feliciana Parish School Dist. No. 1, dated Aug. 6, 1919, and offered Mch. 17. D. G. Lunsford is Parish Supt.

La., Opelousas—(Road).—Bids will be received until 11 A. M. Apr. 5 for \$24,000 of 5 per cent, \$500 denomination bonds of St. Landry Parish Road Dist. No. 9, dated Aug. 1, 1919. Address F. Octave Pavy, Prest. Police Jury.

La., Rayville—(School).—Bids will be received, it is reported, until 10 A. M. April 20 for \$150,000 of 5 per cent semi-annual 1-20-year serial Richland County bonds. Address E. E. Keebler, Secy. County School Board.

Miss., Meridian—(Paving, Bridge, Incinerator).—Election May 4 on \$290,000 of city bonds as follows: \$215,000 paving, \$60,000 bridges; \$15,000 incinerator. Address Mayor Dabney.

Miss., Vicksburg—(Warrants).—Bids received until noon Apr. 5 for \$20,000 of not exceeding 6 per cent Warren County loan warrants. Address J. D. Laughlin, County Clerk.

Mo., Fayette—(Water-works).—Sold to the H. P. Wright Investment Co., Kansas City, for \$70,025, the \$70,000 of 5½ per cent bonds voted Mch. 2 and offered Mch. 15.

N. C., Asheville—(Notes).—Bids will be received until noon April 5 for \$300,000 of 12 months 6 per cent notes of Buncombe County, denomination to suit purchaser. B. A. Patton is Chrmn. County Commrs.

N. C., Belhaven—(Water, Sewer).—Bids will be received until noon Apr. 28 for \$120,000 of 6 per cent \$1000 denomination bonds, dated Apr. 1, as follows: \$60,000 water and \$60,000 sewer. Address D. S. Smith, Clerk Board of Aldermen. For particulars see *Proposals Department*.

N. C., Danbury—(Road).—Sold to the Hanchett Bond Co., Chicago, Ill., at \$35,425, \$35,000 of 6 per cent \$500 denomination 30-year bonds of Big Creek Township, Stokes County, dated Jan. 1, 1920, and voted May, 1919. J. C. Frans is Highway Commr. at Brim, N. C.

N. C., Elizabeth City—(School).—Bids will be received, it is reported, until Apr. 5 for \$20,000 6 per cent 1-20-year serial bonds. M. P. Jennings is Supt. Board of Public Instruction.

N. C., Goldsboro—(Fire Department, Sewer). Reported sold to the National Life Insurance Co. of Montpelier at par, \$86,000 of \$1000 denomination bonds, as follows: \$25,000 fire department and \$61,000 sewer. C. H. Graham is City Clerk.

N. C., Gastonia—(Sewer, Water, Light).—Contemplated to issue bonds as follows: \$145,000 sewer and \$285,000 water and light. Address S. G. Fry, City Clerk.

N. C., Lillington—(Road).—Reported sold locally, \$50,000 of 6 per cent 20-year Averasboro Township, Harnett County, bonds offered Feb. 14. B. O. Townsend is Township Chrmn., Dunn, N. C.

N. C., St. Paul's—(Sewer, Street, Water-works).—Bids will be received until Apr. 15 for \$125,000 of 6 per cent 1925-1950 \$1000 denomination bonds, dated Apr. 1 and voted Mch. 11. Address John S. Butler, Financial Officer.

N. C., Wadesboro—(Water, Sewer, Fire Equipment).—Sold to Bank of Wadesboro at 98.22, \$125,000 of 6 per cent \$1000 denomination serial 17½-year average maturity bonds offered Apr. 1.

Okla., Eufaula—(Road).—\$250,000 of McIntosh

County bonds have been voted. Address County Commrs.

Okla., Carmen—(School).—Sold to R. J. Edwards of Oklahoma City at par, \$72,000 of 5½ per cent 15-year serial \$1000 denomination bonds voted Jan. 31, 1920.

Okla., Carnegie—(School).—\$40,000 of Carnegie School Dist. bonds voted March 2 are reported sold. Address Board of Education.

Okla., Collinsville—(Water-works).—Subject to election Apr. 7, \$135,000 of bonds are reported sold. Address H. W. Gilliland, City Mgr.

Okla., Hartshorne—(School).—Election Apr. 6 on \$50,000 of bonds. Address Judge Hulsey, Clerk.

Okla., Jay—(Road).—Sold to Geo. I. Gilbert of Oklahoma City, it is reported, \$150,000 of Delaware County road bonds. Address County Commrs.

Okla., Muskogee—(Hospital, Park, Athletic Field).—Election Apr. 6 on \$275,000 of bonds as follows: \$150,000 hospital, \$100,000 athletic field and grandstand, \$25,000 park memorial. Address The Mayor.

Okla., Oklahoma City—(Road).—\$750,000 of Oklahoma County bonds were voted Mch. 30. Address County Commrs.

Okla., Okay—(School).—Voted Mch. 24 \$25,000 of bonds Address School Board.

Okla., Pawhuska—(School).—Sold to Geo. W. and J. E. Piersol of Oklahoma City \$12,000 of Pearsonia School Dist., Osage County, bonds.

Okla., Ponca City—(School).—Sold to the Security State Bank of Ponca City at par \$98,000 of \$1000 denomination bonds, voted Feb. 23.

S. C., Abbeville—(Paving).—Contemplated to hold an election on \$90,000 of city bonds. Address Mayor Mars.

S. C., Barnwell—(Sewer, Paving, Water-works).—Voted Apr. 1, \$110,000 of town bonds. P. M. Buckingham, O. W. Harley and Edgar A. Brown are Commrs. of Public Works.

S. C., Columbia—(Paving).—Sold at par to the Palmetto Natl. Bank, \$60,000 of paving certificates. Address The Mayor.

S. C., Florence—(Loan).—Sold to the First National Bank of Florence over \$100,000 of Florence County notes, \$10,000 7 per cent and rest 6 per cent. Address County Commrs.

S. C., Georgetown—(Light Plant).—Voted March 23, \$50,000 of 6 per cent 20-40-year optional bonds. Address Jas. W. Wingate, Mayor.

S. C., Greenville—(School).—Contemplated to vote on \$250,000 of town bonds. Address Dr. J. L. Mann, Supt. of Schools.

S. C., Lexington—(Funding).—Sold to the Home National Bank of Lexington \$100,000 of 5.98 per cent \$10,000 denomination Lexington County short-term notes, dated Apr. 5 and offered Mch. 29. J. E. Leaphart is County Treas.

S. C., Liberty—(School).—Bids will be received until May 1 for \$31,000 of 6 per cent, \$1000 denomination, 1920-1940, Liberty School Dist. bonds, dated May 1, voted Mch. 23. C. E. Bush is Mayor.

S. C., St. George—(Road).—Bids will be received until 11 A. M. April 21 for \$100,000 of 6 per cent \$1000 denomination 10, 20 and 40-year serial bonds of Dorchester County. Address D. L. McAlhany, Secy. Highway Comsn. For particulars see *Proposals Department*.

S. C., Union—(Municipal Improvement, Light, Water, Sewer, Street, Refunding).—Contemplated to vote on \$475,000 of bonds, including \$30,000 electric light, \$70,000 water, \$60,000 sewer, \$200,000 street, \$75,000 refunding. Address The Mayor.

S. C., York—(School).—Election April 1 on not exceeding \$75,000 of 6 per cent 20-year

bonds of Rock Hill School Dist., York County. Address R. C. Burts, Secy. Board of Trustees.

Tenn., Columbia—(Road).—\$75,000 of 5½ per cent \$1000 denomination Maury County bonds offered Mch. 27 were not sold. J. C. Mayer & Co. of Chicago bid par and accrued interest provided the county would allow \$2197 for costs and attorneys' fees and Caldwell & Co. of Jackson bid par less \$1950 for expenses. Address A. W. Lipscomb, County Clerk.

Tex., Amarillo—(Hospital).—Election Apr. 3 on \$250,000 of 5½ per cent Potter County bonds. Address County Commrs.

Tex., Belton—(Water-works, Fire Station).—Election Apr. 6 on \$50,000 of bonds, as follows: \$25,000 water-works and \$25,000 fire station. Address The Mayor.

Tex., Cisco—(Paving).—Sold, it is reported, to the Brown-Crummer Co. of Wichita at par and interest, \$300,000 of 6 per cent \$500 and \$1000 denomination bonds, 1921-1948, inclusive, and dated Nov. 10, 1919.

Tex., Cooper—(Road).—Bids will be received until 2 P. M. April 19, it is reported, for \$500,000 of 5 per cent 30-year Delta

(Continued on Page 158).

Statement of the ownership, management, circulation, etc., required by the Act of Congress of August 24, 1912, of MANUFACTURERS RECORD, published weekly at Baltimore, Md., for April 1, 1920.

State of Maryland,
City of Baltimore.

Before me, Edwin T. Sickle, a Notary Public, in and for the State and city aforesaid, personally appeared Frank Gould, who, having been duly sworn according to law, deposes and says that he is the Vice-President of the Manufacturers Record Publishing Co., and that the following is, to the best of his knowledge and belief, a true statement of the ownership, management, etc., of the aforesaid publication for the date shown in the above caption, required by the Act of August 24, 1912, embodied in Section 443, Postal Laws and Regulations, to wit:

1. That the names and addresses of the publisher, editor, managing editor and business managers are: Publisher, Manufacturers Record Publishing Co., Baltimore, Md.; editor, Richard H. Edmonds, Manufacturers Record, Baltimore, Md.; managing editor, none; business managers, Frank Gould and Victor H. Power, Manufacturers Record, Baltimore, Md.

2. That the owners are: Richard H. Edmonds, Manufacturers Record, Baltimore, Md.; Mrs. Addie L. Edmonds, Manufacturers Record, Baltimore, Md.; Miss Mary E. Edmonds, Manufacturers Record, Baltimore, Md.; Frank Gould, Manufacturers Record, Baltimore, Md.; I. S. Field, Manufacturers Record, Baltimore, Md.; C. R. Marchant, Manufacturers Record, Baltimore, Md.; V. H. Power, Manufacturers Record, Baltimore, Md.; J. Robert Gould, Manufacturers Record, Baltimore, Md.

3. That there are no outstanding bonds, mortgages or other liens against the property, except mortgage for \$5,000 on building, held by Savings Bank of Baltimore.

4. That the two paragraphs next above, giving the names of the owners, stockholders and security-holders, if any, contain not only the list of stockholders and security-holders as they appear upon the books of the company, but also, in cases where the stockholder or security-holder appears upon the books of the company as trustee or in any other fiduciary relation, the name of the person or corporation for whom such trustee is acting is given; also that the said two paragraphs contain statements embracing affiant's full knowledge and belief as to the circumstances and conditions under which stockholders and security-holders who do not appear upon the books of the company as trustees hold stock and securities in a capacity other than that of a bona-fide owner, and this affiant has no reason to believe that any other person, association or corporation has any interest, direct or indirect, in the said stock, bonds or other securities than as so stated by him.

FRANK GOULD,
Vice-President.

Sworn to and subscribed before me this 26th day of March, 1920.

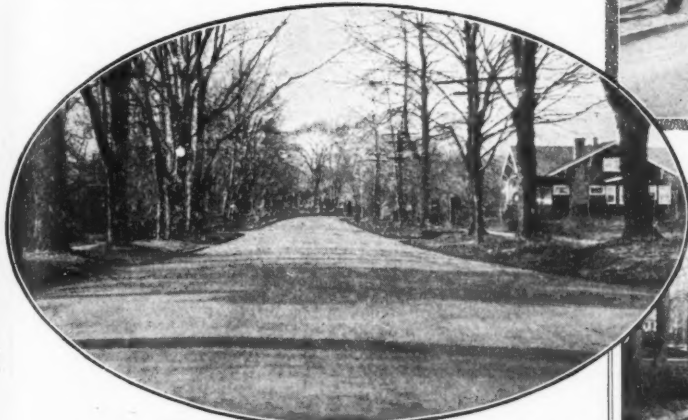
EDWIN T. SICKLE,
Notary Public.

(My commission expires May 3, 1920.)

In writing to parties mentioned in this department, it will be of advantage to all concerned if the Manufacturers Record is mentioned.

Tarvia

Preserves Roads
Prevents Dust~



West Broad Street, Stamford, Conn., in front of Hospital. Maintained with "Tarvia-B". This is one of the many streets in Stamford that is ready for traffic at all seasons of the year.



Atlantic Street, Stamford, Conn., constructed with "Tarvia-X" in 1918.



Prospect Street, Stamford, Conn., constructed with "Tarvia-X," penetration method, in 1916, and since maintained with "Tarvia-B."

How Stamford's streets are maintained at low cost with Tarvia——

With many miles of waterbound macadam streets, Stamford, Conn., had considerable of a problem in its road maintenance.

How Stamford maintains these streets at low cost is told by Mr. Paul Nash, City Engineer, in a recent letter:

"About ten years ago the City of Stamford first used 'Tarvia-B' experimentally as a road preservative, and each and every year since that time has depended mainly upon this material for keeping its streets in serviceable condition.

"We have at this time about thirty miles of water-bound macadam roads which are treated annually with one application of 'Tarvia-B' (some needing attention every other year only), using about 60,000 gallons of 'B' or about 2000 gallons per mile, at a cost of from four to six cents per square yard.

"The condition of these roads at all times of the year is satisfactory and they can all be classed as good roads."

Salvaging old streets with "Tarvia-X"

Stamford also uses the "Tarvia-X" penetration method of resurfacing old macadam roads that are past treating. Mr. Nash's letter goes on to say:

"Our experience with 'Tarvia-X' penetration work has proved that there is much merit in this type of road even under quite heavy traffic. At a small annual cost, I am convinced that this type of road can be kept in first-class condition almost indefinitely * * * Our oldest road of this type, now six years in service, is apparently in as good condition and as smooth as when built."

Mr. Nash concludes his letter by saying:

"I want to say a word in commendation of your 'KP' patching material. We could not do without it."

Stamford's experience proves again that there is a grade of Tarvia for practically every road condition.

Special Service Department

This company has a corps of trained engineers and chemists who have given years of study to modern road problems. The advice of these men may be had for the asking by any one interested. If you will write to the nearest office regarding road problems and conditions in your vicinity, the matter will be given prompt attention.

Illustrated booklet telling about the various Tarvia treatments free on request.

New York	Chicago	Philadelphia	Youngstown	The <i>Barrett</i> Company		Milwaukee	Boston	St. Louis	Baltimore
Cleveland	Cincinnati	Pittsburgh	Toledo	Richmond		Richmond	Detroit	New Orleans	Lebanon
Birmingham	Kansas City	Minneapolis	Columbus	Latrobe		Nashville	Nashville	Johnstown	Hanover
Seattle	Peoria	Atlanta	Duluth	Dallas		Washington	Washington	Buffalo	Elizabeth
THE BARRETT COMPANY, Limited:				Montreal	Toronto	Winnipeg	Vancouver	St. John, N. B.	Sydney, N. S.

Wm. J. Oliver's Vindication Complete

H. B. LINDSAY
ROBT. S. YOUNG
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LAW OFFICES
LINDSAY, YOUNG & YOUNG
300-304 EAST TENN. NAT'L BANK BLDG.
KNOXVILLE, TENNESSEE

Mr. W. J. OLIVER,
Knoxville, Tenn.

March 1, 1920.

Dear Sir—I hand you herewith as per your request a very brief statement of the charges against you and others in the United States Court and the result of the trial of the case.

First: You and nine other defendants, comprising the officials and foremen of the W. J. Oliver Manufacturing Company, were charged with having entered into a conspiracy to defraud the Government by making defective shells or projectiles.

On the trial not one syllable of evidence was introduced to support these charges and the Court directed the jury to return a verdict of not guilty thereon.

Second: You and the other defendants were charged with having cut extra pieces from cast-iron practice shells and from the 155 mm. steel shells for the purpose of fraudulently using them to deceive the inspectors.

We admitted that you had cut more pieces from both kinds of shells than the Government inspectors called for, but took the position that we did so for the purpose of carrying on experimental work as to the proper mixtures in making the cast-iron shells, and the proper heat treatment of the steel shells, and that this was done with the full knowledge of the Chief Government Inspector. The proof introduced by the Government sustained your contention and the Court directed a verdict in behalf of the defendants upon this count.

Third: You and the other defendants were charged with having run some steel shells through to completion without having heat-treated them. We denied that this charge was true.

The Government proved by one witness that he had run a few shells through without heat-treating them. He was not corroborated in this statement by any other witness, and several witnesses, including Government inspectors, proved that such a thing would have been impossible, as accurate accounts were kept of the number of shells that were heat-treated and of the number that were finally completed, and that these numbers had to tally or coincide, and it was further proven that the shells could not have been machined and completed without being heat-treated.

Fourth: The defendants were charged with having put two lead discs under the copper cover on the base of the shells, alleging that this made a defective shell. We admitted that you had put two lead discs on certain shells that were from one to three ounces light, but that this was done at the suggestion and with the knowledge of the Government inspectors, and that the doing so did not in any way impair or interfere with the proper functioning of the shell.

The proof introduced by the Government showed that Government inspectors suggested the idea of putting two lead discs in light shells to make them of proper weight, and that it was done with their knowledge and without objection; and their expert witnesses proved that two lead discs was not injurious to the shell if they were securely fastened, and the proof on this point showed that your method of fastening the lead disc was a very satisfactory method and that your methods of doing so was at the suggestion of Government officials copied by other manufacturers.

Fifth: The defendants were charged with closing the nose of shells that were too large by the use of a die and sledge hammer without heating the shell, and that such practice was injurious to the steel and was calculated to get the nose of the shell out of proper shape or alignment.

We admitted that we used the sledge hammer and die to close the nose of a shell that was too large by not more than five thousandths of an inch without heating the shells. We contended that this method was the usual and approved method of doing this work, and that it was done with the full knowledge, consent and co-operation of the Government inspectors, and that it in no way impaired the quality of the steel or of the shell.

The proof introduced by the Government showed that this method of closing was the usual method; that it was done with the full knowledge of the Government inspectors, and there was no proof shown to the effect that any shell was made defective by this practice. The proof further showed that after the Government took over your plant it continued to shrink or close the nose of shells that were not more than five thousandths of an inch too large, but used a steam hammer instead of a sledge hammer.

Sixth: The defendants were charged with intentionally making defective shells with the purpose to hinder the United States Government in successfully carrying on the war. The defendants denied the truth of the charge.

The proof failed to show that there was a single defective shell made by the Wm. J. Oliver Manufacturing Company, although it made and delivered 88,000 shells, and the proof, on the contrary, conclusively established the fact that you and every other defendant were doing your best to make the most perfect shells possible in the largest quantity possible. Therefore, the Court directed the jury to return a verdict of not guilty as to these charges.

Seventh: The defendants were charged with making defective shells that they ought to have known would have resulted in obstructing the Government in carrying to a successful conclusion the war in which it was engaged.

The defendants denied that this charge was true.

The proof failed to show that there was a single defective shell made by your factory, and that there was no ground for these charges against the defendants.

All other charges having been dismissed by the Court and in view of the fact that the Government had no proof to substantiate this latter charge, it voluntarily dismissed the remaining counts in the indictment, charging that the defendants ought to have known that the defective shells would hinder and obstruct the Government in its prosecution of the war.

The proof further showed that every act of every defendant in the making of shells seemed to be directed toward making the best shells possible and to make them as fast as possible, and that there was no suspicion of disloyalty on the part of any of the defendants and that the witnesses regarded you as being very particular in turning out high-class work, and believed that you were thoroughly patriotic.

The defense stated in the beginning that they were not guilty of doing any wrong and that the prosecution was brought about by certain union labor agitators who were bent on either unionizing your shop or taking its management out of your hands, and that there was a conspiracy entered into by these union labor agitators which was to some extent participated in by the Government officials to accomplish this result.

The proof further showed that you at all times stood out against the "closed shop" idea and desire of the agitators, and that they were very bitter against you; that a strike order on their part existed against your factory throughout the entire contract to make shells for the United States and also while your factory was making shells for the Italian Government. That there was frequent evidences found in the shop of an effort on the part of somebody to curtail production by crippling or breaking down machinery by the use of crowbars, bolts, nuts and other methods, and by the use of emery dust being put into the bearings of machinery.

The proof further showed that in addition to paying your laborers a per diem you were paying a bonus of a certain amount for each operation, and the proof showed that this bonus system was strongly opposed by organized labor, but that it had the effect to stimulate the laborers, making them more efficient and increased the output of shells.

The proof further showed that you caused a serial number to be stamped on each shell at the first operation and that any laborer who spoiled a shell in performing his operation upon it was charged with the value of the forging and with the cost of work on the shell up to the time he spoiled it. The proof showed that this arrangement resulted in making every laborer careful to not injure the shell by design or carelessness, and that this arrangement prevented unfriendly labor from turning out defective work, and his only chance to injure the management was by crippling machinery, etc.

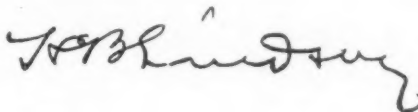
The proof showed that on September 9, 1918, you discharged several employees who were found to be labor agitators engaged in an effort to unionize your factory. That these discharged laborers immediately went to the office of the attorney of the Central Labor Union organization and made affidavits that they had been discharged because they had joined the union; that they were advised before hand that you could not discharge them for joining the union, that if you undertook to do so, the War Labor Board would take the matter in hand and reinstate them, and that they believed this would be done; that they had heard that that had been the result in other instances where laborers had been discharged for joining the union.

The proof showed that on September 16, 1918, there occurred a fire in the Wm. J. Oliver Manufacturing Company's plant. Proof further showed that beginning about September 20, 1918, a series of conferences were being held between certain Government inspectors and other officials and discharged employees and labor organization officials at which discharged employees made affidavits that they had been discharged for joining the union, and, coupled with it certain charges of irregularities, that the object and purpose of making these affidavits was that they might be reinstated in their work with full pay for lost time, etc.

All of these things were shown by the Government witnesses, and the case ended and was turned out of Court on the showing made by the Government without any proof being introduced at all by the defendants. There were several incidents proven in the trial, showing conclusively that certain employees were doing things that indicated that there was an organized scheme and understanding among them to manufacture false evidence against the defendants with the purpose to use it if it became necessary in their purpose and effort to unionize your plant.

If you want or feel that you need a more comprehensive or detailed statement, I will be pleased to furnish it to you.

Yours very truly,



HBL:sh.

County bonds. Address I. B. Lane, County Judge.

Tex., Dumas—(Road).—Sold to Breg, Garrett & Co. of Dallas, it is reported, \$30,000 5½ per cent \$1000 denomination 1924-1934 optional Moore County bonds, dated Sept. 1, 1919.

Tex., Eastland—(School).—Bids will be received any time for \$50,000 of 5 per cent \$1000 denomination 20-40-year optional bonds of Eastland Independent School Dist., Eastland County, voted in December. Address J. A. Beard.

Tex., Eldorado—(School).—Election Apr. 10 on \$30,000 of Eldorado Independent School Dist., Schleicher County, bonds. Address County School Board.

Tex., Fort Worth—(School).—Election Apr. 2 on \$35,000 of bonds for South Fort Worth. Address Board of Education.

Tex., Pittsburg—(Road).—Voted Mch. 30, \$500,000 of Camp County bonds. Address County Commrs.

Tex., Rockport—(Road).—Bids will be received until 2 P. M. April 10 for \$100,000 of 5½ per cent 1-30 year serial \$1000 denomination Aransas County bonds, dated April 10 and voted Feb. 10. Address John C. Herring, County Clerk.

Va., Houston—(Road).—The report that an election was contemplated on \$450,000 of Halifax County bonds is denied. J. T. Lacy is Clerk County Commrs.

Va., Norfolk—(Loan).—Bids will be received until noon Apr. 2, it is reported, for \$1,500,000 5 per cent, semi-annual, 3-year, temporary water-loan bonds. Address Chas. E. Ashburner, City Mgr.

Va., Pearisburg—(Road).—Election April 6 on \$300,000 of Giles County bonds. Address County Supervisors.

Va., Wakefield—(Electric-light Plant).—Bids will be received until about June 1 for \$20,000 of 6 per cent, \$1000 denomination, not exceeding 10 years, city bonds voted Mch. 23. Address W. H. Savedge, Town Treasurer. J. I. Knight is Mayor.

W. Va., Charleston—(Road).—Kanawha County bonds have been voted thus: \$60,000 Washington Dist., \$25,000 Pocahontas Dist. Address County Commrs.

W. Va., Fairmont—(School).—Election Apr. 20 on \$98,000 of 5 per cent, \$1000 denomination. Fairmont Dist., Marion County, bonds, dated June 1, 1925-1938, inclusive. A. A. Neptune is Pres. Board of Education, and J. F. Ice, Secy.

W. Va., Gassaway—(Street).—Election Apr. 8 on \$50,000 of 6 per cent \$500 denomination town bonds dated May 1, 1920, and due May 1, 1930. Address R. Lee Boone, Mayor.

W. Va., Ripley—(School).—Bids will be received until Apr. 15 for \$18,000 of 5 per cent Ripley Independent School Dist., Jackson County, bonds, dated Apr. 1, 1920, and due Apr. 1, 1940, subject to call Apr. 1, 1925. Address Geo. Straley, Secy. Board of Education.

W. Va., Union—(Road).—Voted Mch. 23, \$120,000 of Union Dist., Monroe County, bonds. Address County Commrs.

People's Bank of Scranton, S. C., will increase capital from \$15,000 to \$50,000.

First National Bank of Lake Charles, La., has increased capital from \$100,000 to \$200,000.

Fourth National Bank of Atlanta, Ga., has increased capital from \$600,000 to \$1,200,000.

First National Bank of Memphis, Tex., has increased capital from \$55,000 to \$100,000.

Citizens' National Bank of Crosbyton, Tex., has increased capital from \$40,000 to \$50,000.

First National Bank of Lavonia, Ga., has increased capital from \$60,000 to \$80,000.

Central Loan & Trust Co., Burlington, N. C., has increased capital stock from \$100,000 to \$300,000.

Calcasieu National Bank of Southwest Louisiana at Lake Charles, La., has increased capital from \$500,000 to \$750,000.

Citizens' Bank & Savings Co., Russellville, Ala., will increase capital stock from \$55,000 to \$50,000.

Shenandoah Valley National Bank of Winchester, Va., has increased capital from \$200,000 to \$300,000.

Manufacturers' National Bank, Newnan, Ga., will increase capital stock from \$60,000 to \$125,000.

A summary of condition of the State banks of Alabama as of Feb. 27 shows total resources of \$138,375,254, an increase of \$2,725,321 since the call of Nov. 17 last.

A compilation of reports of the State banks in Tennessee at the close of business Feb. 27 shows that their total resources are \$259,675,761, an increase of \$37,814,687 since Sept. 12 last. As there are \$223,904,000 of national bank resources in the State, these two totals combined give aggregate banking resources in Tennessee of \$483,579,761.

Financial Notes.

Albany National Bank, Albany, Tex., will increase capital from \$50,000 to \$80,000.

Union Banking Co., Monroe, La., will increase capital stock from \$40,000 to \$60,000.

National Bank of Leesville, S. C., will increase capital stock from \$25,000 to \$50,000.

THE USE OF CREDIT

We supply additional capital to concerns with established earnings where such loans form the basis for a bond, note or stock issue.

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OF MARYLAND

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YOUNG & SELDEN COMPANY

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